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#### **RESEARCH THAT MATTERS**

HOW MANY ADULTS AND YOUTH IDENTIFY AS TRANSGENDER IN THE UNITED STATES?

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School of Law Williams Institute

**UCLA** 

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## **EXECUTIVE SUMMARY**

Recent data from the CDC's Behavior Risk Factor Surveillance System (BRFSS) and Youth Risk Behavior Survey (YRBS) provide an opportunity to update prior population estimates of the number of adults and youth who identify as transgender in the U.S. In 2016 and 2017, the Williams Institute used data from the 2014-15 BRFSS to estimate the number of adults (ages 18 and older) and youth (ages 13 to 17) who identify as transgender. Since then, a total of 43 states have used the BRFSS optional gender identity module for at least one year, providing more years of data from more states since these initial estimates. Additionally, in 2017, the YRBS, a national survey of high school students, began asking respondents if they are transgender. Since 2017, fifteen states have included this question in their YRBS statewide questionnaire. In this study, we use data from the 2017 and 2019 YRBS and the 2017-2020 BRFSS to find that:

- Over 1.6 million adults (ages 18 and older) and youth (ages 13 to 17) identify as transgender in the United States, or 0.6% of those ages 13 and older.
- Among U.S. adults, 0.5% (about 1.3 million adults) identify as transgender. Among youth ages 13 to 17 in the U.S., 1.4% (about 300,000 youth) identify as transgender.
- Of the 1.3 million adults who identify as transgender, 38.5% (515,200) are transgender women, 35.9% (480,000) are transgender men, and 25.6% (341,800) reported they are gender nonconforming.
- Research shows transgender individuals are younger on average than the U.S. population.
  We find that youth ages 13 to 17 are significantly more likely to identify as transgender (1.4%) than adults ages 65 or older (0.3%).
- The racial/ethnic distribution of youth and adults who identify as transgender appears generally similar to the U.S. population, though our estimates mirror prior research that found transgender youth and adults are more likely to report being Latinx and less likely to report being White compared to the U.S. population.
- Our estimates of the percent of residents in U.S. regions who identify as transgender range from 1.8% in the Northeast to 1.2% in the Midwest for youth ages 13 to 17, and range from 0.6% in the Northeast to 0.4% in the Midwest for adults.
- At the state level, our estimates range from 3.0% of youth ages 13 to 17 identifying as transgender in New York to 0.6% in Wyoming. Our estimates for the percentage of adults who identify as transgender range from 0.9% in North Carolina to 0.2% in Missouri.

Overall, based on our estimates from 2016-2017 and the current report, we find that the percentage and number of adults who identify as transgender has remained steady over time. The availability of the YRBS data has given us a more direct look into youth gender identity and provides better data than was previously available to us for estimating the size and characteristics of the youth population. Youth ages 13 to 17 comprise a larger share of the transgender-identified population than we previously estimated, currently comprising about 18% of the transgender-identified population in the U.S., up from 10% previously.

## INTRODUCTION

A growing number of population-based surveys in the United States, and internationally, ask questions to identify transgender people, including surveys conducted by the U.S. federal government.<sup>1</sup> In 2014, the Centers for Disease Control and Prevention (CDC) began offering an optional module on the Behavior Risk Factor Surveillance System (BRFSS) for states to use to ask respondents if they consider themselves to be transgender.<sup>2</sup> In 2016, the National Crime Victimization Survey (NCVS) included a two-step approach to identify those whose gender identity differs from their sex assigned at birth.<sup>3</sup> In 2017, the CDC's Youth Risk Behavior Survey (YRBS), a national survey of high school students, began asking respondents if they are transgender.<sup>4</sup> In July 2021, the U.S. Census Bureau's Household Pulse Survey adopted the two-step approach.<sup>5</sup> Internationally, Canada added the two-step approach to their national census in 2021, while Belgium and New Zealand have also included measures to identify transgender people in population-based surveys.<sup>6</sup>

With new and emerging data sources, like the NCVS and Household Pulse Survey, researchers will have new opportunities to expand our knowledge about the characteristics and experiences of the transgender population. In the U.S., we have found from the NCVS that transgender people are more likely to experience violent victimization compared to cisgender people.<sup>7</sup> Household Pulse data allowed us to assess disparities in food insecurity among transgender people during the COVID-19 pandemic.<sup>8</sup> Yet, limitations exist among these data sources that affect the ability to create estimates of the size and demographic characteristics of the transgender people and us to identify transgender people only among victims of violence, which

<sup>&</sup>lt;sup>1</sup>Population-based surveys allow findings to be generalized to the population from which the sample is drawn.

<sup>&</sup>lt;sup>2</sup>Centers for Disease Control and Prevention (CDC). *BRFSS Questionnaires*. Atlanta, GA: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention. https://www.cdc.gov/brfss/questionnaires/index.htm <sup>3</sup>National Crime Victimization Survey. (2016). *NCVS-1 Basic Screen Questionnaire*. (pp. 7-8). Bureau of Justice Statistics. https://www.bjs.gov/content/pub/pdf/ncvs16\_bsq.pdf.

<sup>&</sup>lt;sup>4</sup>Johns, M.M., Lowry, R., Andrzejewski, J., et al. (2019). Transgender Identity and Experiences of Violence Victimization, Substance Use, Suicide Risk, and Sexual Risk Behaviors Among High School Students–19 States and Large Urban School Districts, 2017. MMWR Morb Mortal Wkly Rep, 68, 67–71. http://dx.doi.org/10.15585/mmwr.mm6803a3.

<sup>&</sup>lt;sup>5</sup>United States Census Bureau. (2021). *Household Pulse Survey: Measuring Social and Economic Impacts during the Coronavirus Pandemic*. https://www.census.gov/programs-surveys/household-pulse-survey.html.

<sup>&</sup>lt;sup>6</sup>Statistics Canada. (2022). Canada is the first country to provide census data on transgender and non-binary people. *The Daily*. https://www150.statcan.gc.ca/n1/daily-quotidien/220427/dq220427b-eng.htm?HPA=1. In their 2021 Census, Statistics Canada found that 0.33% of those age 15 and older were transgender or nonbinary.

<sup>&</sup>lt;sup>7</sup>A. R. Flores, L. Langton, I. H. Meyer, A. P. Romero. (2020). Victimization rates and traits of sexual and gender minorities in the United States: Results from the National Crime Victimization Survey, 2017. *Sci. Adv. 6*(40). https://www.science.org/doi/10.1126/sciadv.aba6910.

<sup>&</sup>lt;sup>8</sup>Conron, K.J. & O'Neill, K. (2021). Food Insufficiency Among Transgender Adults During the COVID-19 Pandemic. The Williams Institute, UCLA, Los Angeles, CA.

undermines the ability to make population-level estimates.<sup>9</sup> The U.S. Census Bureau is fielding the Household Pulse Survey as a part of their Experimental Data Series.<sup>10</sup> We continue to learn about the Household Pulse Survey methods and its promise and limitations as a data source to study the population size and characteristics of transgender people in the U.S.<sup>11</sup> Although they do not yet collect data about gender identity in all U.S. states, the CDC's BRFSS and YRBS currently provide the best available data to generate estimates of the number of adults and youth who identify as transgender.

In 2016 and 2017, the Williams Institute used data from the CDC's 2014-15 BRFSS to estimate the number of adults (ages 18 and older) and youth (ages 13 to 17) who identify as transgender.<sup>12</sup> Since then, a total of 43 states have used the BRFSS optional gender identity module for at least one year, providing more years of data from more states since these initial estimates. Additionally, since 2017, 15 states have included a question to identify transgender youth in their YRBS statewide questionnaire.<sup>13</sup> These more recent data from the BRFSS and the YRBS provide an opportunity to update our prior population estimates of the number of adults and youth who identify as transgender in the U.S. In this report, we describe our updated estimates, including estimates regarding gender, age, and race/ ethnicity at the national level and age and race/ethnicity at the regional and state levels. A detailed description of our methods and accompanying appendix can be found at the end of this report.

<sup>&</sup>lt;sup>o</sup> From 2016 through the second quarter of 2019, questions pertaining to sexual orientation and gender identity were included in the NCVS. In 2019, the Bureau of Justice Statistics determined that the sexual orientation and gender identity questions would be administered only to those age 16 or older who reported violent victimization (not to all respondents). More recently, BJS has determined that the sexual orientation and gender identity items will be reinstated and administered to the original universe of all persons age 16 or older beginning in January 2022. *See* Bureau of Justice Statistics. (2021). *NCVS OMB Supporting Statement Part A*. Office of Management and Budget, Office of Information and Regulatory Affairs. https://www.reginfo.gov/public/do/PRAViewDocument?ref\_nbr=202109-1121-002; Office of Information and Regulatory Affairs. (2021). *OIRA Conclusion, OMB Control No:* 1121-0111. Office of Management and Budget. https://www.reginfo.gov/public/do/PRAViewICR?ref\_nbr=202109-1121-002#.

<sup>&</sup>lt;sup>10</sup>United States Census Bureau. (2021). *Measuring Household Experiences during the Coronavirus Pandemic*. https://www.census.gov/data/experimental-data-products/household-pulse-survey.html.

<sup>&</sup>lt;sup>11</sup>United States Census Bureau. (2021). Source of the Data and Accuracy of the Estimates for the Household Pulse Survey – Phase 3.2. https://www2.census.gov/programs-surveys/demo/technical-documentation/hhp/Phase3-2\_Source\_ and\_Accuracy\_Week39.pdf; Jesdale, B.M. (2021). Counting Gender Minority Populations in the Household Pulse Survey (The AGENID=2 Memo). National LGBT Cancer Network. https://cancer-network.org/wp-content/uploads/2021/10/ Counting-GM-People-in-Pulse-Data.pdf.

<sup>&</sup>lt;sup>12</sup>Flores, A.R., Herman, J.L., Gates, G.J., & Brown, T.N.T. (2016). *How Many Adults Identify as Transgender in the United States*? Los Angeles, CA: The Williams Institute; Herman, J.L., Flores, A.R., Brown, T.N.T., Wilson, B.D.M., & Conron, K.J. (2017). *Age of Individuals who Identify as Transgender in the United States*. Los Angeles, CA: The Williams Institute. Those who report that they consider themselves to be transgender in the BRFSS may identify with and use different gender identity terms outside the survey context, such as man, woman, and nonbinary.

<sup>&</sup>lt;sup>13</sup>The count of 15 states is based on authors' original analysis of YRBS data.

## FINDINGS

# NATIONAL POPULATION ESTIMATES BY GENDER IDENTITY, AGE, AND RACE/ETHNICITY

Nationally, we estimate that 0.6% of those ages 13 and older identify as transgender in the United States, which is about 1.6 million individuals based on current U.S. population size. Among adults, 0.5% (over 1.3 million adults) identify as transgender. Among youth ages 13 to 17, 1.4% (about 300,000 youth) identify as transgender. The BRFSS and YRBS data allow us to further describe gender identity for adults, age categories for individuals ages 13 and older, and race/ethnicity separately for youth and adults.

#### **Gender Identity**

The BRFSS optional gender identity module includes a follow-up question of adults who identify as transgender to further describe their gender identity.<sup>14</sup> Based on that follow-up question, we find that of adults who identify as transgender, 38.5% (515,200) are transgender women, 35.9% (480,000) are transgender men, and 25.6% (341,800) reported they are gender nonconforming. It is possible that transgender adults who identify as nonbinary may have reported their gender in the BRFSS as gender nonconforming. A recent study estimated that nearly one-third of transgender adults identify as nonbinary, which is similar to our finding of 25.6%.<sup>15</sup> The YRBS does not include a follow-up question to allow respondents to further describe their gender identity. Therefore, we are unable to provide a more detailed description of gender identities among youth.



#### Figure 1. Gender identity of adults who identify as transgender in the U.S.

<sup>&</sup>lt;sup>14</sup>The BRFSS questionnaire asks, "Do you consider yourself to be transgender?" If the answer is yes, the respondent is then asked, "Do you consider yourself to be 1. male-to-female, 2. female-to-male, or 3. gender nonconforming?" We categorize those who answered "male-to-female" as transgender women, those who answered "female-to-male" as transgender men, and those who answered "gender noncomforming" as gender noncomforming.

<sup>&</sup>lt;sup>15</sup>Wilson, B.D.M & Meyer, I.H. (2021). Nonbinary LGBTQ Adults in the United States. Los Angeles, CA: The Williams Institute.

#### Age

We describe the age of individuals who identify as transgender in two ways: the percentage of each age group that identifies as transgender and the age distribution of the transgender-identified population compared to the age distribution of the U.S. population. When looking at the percentage in each age group that identifies as transgender, those in the youngest age groups appear to have a higher percentage of those who identity as transgender. For instance, 1.4% of those ages 13 to 17 identify as transgender whereas 0.3% of those ages 65 and older identify as transgender. While these age group differences appear to be only statistically significant between the oldest and youngest age groups, this age trend among transgender individuals is consistently found in studies using population-based samples.<sup>16</sup>

	PERCENT	NUMBER
13 to 17	1.4%	300,100
18 to 24	1.3%	398,900
25 to 64	0.5%	766,500
65 and older	0.3%	171,700
13 and older	0.6%	1,637,200

Table 1. Percent of each age group that identifies as transgender in the U.S.

When looking at the age distribution of those who identify as transgender, it appears that the age distribution of transgender-identified individuals (ages 13 and older) is younger compared to the U.S. population. For instance, those ages 13 to 17 comprise 18.3% of transgender-identified individuals (ages 13 and older), whereas that age group comprises 7.6% of the U.S. population (ages 13 and older). This age trend is consistent with prior research that has found transgender individuals have a lower mean age than cisgender individuals.<sup>17</sup>

<sup>&</sup>lt;sup>16</sup> Jones, J. M. (2022). *LGBT Identification in U.S. Ticks up to 7.1%*. Gallup. https://news.gallup.com/poll/389792/lgbtidentification-ticks-up.aspx; Herman, J.L., Flores, A.R., Brown, T.N.T., Wilson, B.D.M., & Conron, K.J. (2017). *Age of Individuals who Identify as Transgender in the United States*. Los Angeles, CA: The Williams Institute.; Feldman, J.L., Luhur, W.E., Herman, J.L., Poteat, T., Meyer, I.H. (2021). Health and health care access in the US transgender population health (TransPop) survey. *Andrology*, *9*, 1707–1718. https://doi.org/10.1111/andr.13052.

<sup>&</sup>lt;sup>17</sup>Feldman, J.L., Luhur, W.E., Herman, J.L., Poteat, T., Meyer, I.H. (2021). Health and health care access in the US transgender population health (TransPop) survey. *Andrology*, *9*, 1707–1718. https://doi.org/10.1111/andr.13052; Andrew R. Flores, Ilan H. Meyer, Lynn Langton, Jody L. Herman. (2021). Gender Identity Disparities in Criminal Victimization: National Crime Victimization Survey, 2017–2018. *American Journal of Public Health* 111(4), 726-729; Statistics Canada. (2022). Canada is the first country to provide census data on transgender and non-binary people. *The Daily*. https://www150.statcan.gc.ca/n1/daily-quotidien/220427/dq220427b-eng.htm?HPA=1.

Figure 2. Age distribution among those who identify as transgender and among the U.S. population (ages 13 and older)



#### Race/Ethnicity

Similar to age, we look at race and ethnicity of individuals who identify as transgender in two different ways: the percentage of each race/ethnicity group that identifies as transgender and the racial and ethnic distribution of the transgender-identified population compared to the racial and ethnic distribution of the U.S. population. We stratify this analysis by age, separately describing the race/ ethnicity of youth and adults. Tables 2 and 3 describe the percentage of each racial/ethnic group that identifies as transgender, along with the population estimate. Differences between racial/ethnic groups are not statistically significant, but our findings do reflect prior research with population-based samples that have found that Latinx people, American Indian or Alaska Native, and biracial/multiracial groups appear more likely than White people to identify as transgender.<sup>18</sup>

	PERCENT	NUMBER
White	0.5%	731,200
Black	0.6%	173,500
Asian	0.5%	77,300
AIAN	0.9%	14,500
Latinx	0.7%	289,700
Biracial, Multiracial, or Other Race/Ethnicity	1.0%	50,900

Table 2. Percent of each racial/ethnic group that identifies as transgender in the U.S., an	nong
adults (ages 18 and older)	

Note: White, Black, Asian, and American Indian or Alaska Native (AIAN) are non-Hispanic. The Latinx category includes Hispanic and Latinx people of any race. Biracial, multiracial, and other race/ethnicity are non-Hispanic.

<sup>&</sup>lt;sup>18</sup>Feldman, J.L., Luhur, W.E., Herman, J.L., Poteat, T., Meyer, I.H. (2021). Health and health care access in the US

transgender population health (TransPop) survey. *Andrology*, *9*, 1707–1718. https://doi.org/10.1111/andr.13052; Meyer, I. H., Brown, T. N., Herman, J. L., Reisner, S. L., & Bockting, W. O. (2017). Demographic Characteristics and Health Status of Transgender Adults in Select US Regions: Behavioral Risk Factor Surveillance System, 2014. *American Journal of Public Health*, 107(4), 582–589. https://doi.org/10.2105/AJPH.2016.303648.

Table 3. Percent of each racial/ethnic group that identifies as transgender in the U.S., among youth (ages 13 to 17)

	PERCENT	NUMBER
White	1.3%	138,800
Black	1.4%	39,600
Asian	1.0%	10,800
AIAN	1.8%	3,000
Latinx	1.8%	92,900
Biracial, Multiracial, or Other Race/Ethnicity	1.5%	15,000

Note: White, Black, Asian, and American Indian or Alaska Native (AIAN) are non-Hispanic. The Latinx category includes Hispanic and Latinx people of any race. Biracial, multiracial, and other race/ethnicity are non-Hispanic.

The racial and ethnic distribution of adults and youth appear generally similar to the racial/ethnic distribution of the U.S. population. However, transgender-identified youth and adults appear more likely to report being Latinx and less likely to report being White, as compared to the U.S. population (see Figures 3 and 4). As described above, this trend is in keeping with prior research.<sup>19</sup>

## Figure 3. Race/ethnicity of adults who identify as transgender and of the U.S. population (ages 18 and older)





Figure 4. Race/ethnicity of youth who identify as transgender and of the U.S. population (ages 13-17)

#### **REGIONAL AND STATE POPULATION ESTIMATES, BY AGE AND RACE**

Adults and youth who identify as transgender in the U.S. reside in all 50 states and the District of Columbia. Table 4 describes the percentage of each age group that identifies as transgender, and the population estimate for each, in the four U.S. regions, and in each state within each region. Overall, for youth ages 13 to 17, we find that 1.4% identify as transgender, which is about 300,000 youth. Our estimates of youth ages 13 to 17 who identify as transgender are similar across U.S. regions, ranging from 1.8% in the Northeast to 1.2% in the Midwest. At the state level, our estimates range from 3.0% of youth ages 13 to 17 identifying as transgender in New York to 0.6% in Wyoming.<sup>20</sup> Among all adults, we find that 0.5%, or over 1.3 million, identifies as transgender. Our estimates of adults in U.S. regions who identify as transgender range from 0.6% in the Northeast to 0.4% in the Midwest. At the state level, our estimates range from 0.9% of adults identifying as transgender in North Carolina to 0.2% in Missouri.<sup>21</sup>

<sup>&</sup>lt;sup>20</sup>Appendix Table A4 describes 95% credible intervals for our national, regional, and state level estimates for youth and adults by age group. This table can serve as a reference to help determine if estimates across regions and states appear to be significantly different from each other. For instance, the percent of youth in New York who identify as transgender (3.0%) is significantly higher than 10 other states, meaning the upper bound estimate in these 10 states is lower than the lower bound estimate for New York. For adults, the percent that identifies as transgender in North Carolina (0.9%) is significantly higher than 19 other states.

<sup>&</sup>lt;sup>21</sup>The District of Columbia is not included in this range for states. DC had a notably high percentage of transgenderidentified adults (0.92%), but is considered an outlier compared to the rest of the U.S. states due to its unique geographic (urban) and demographic profile.

Table 4. Regional and state-level estimates of those who identify as transgender in the U.S. population by age group (ages 13 and older)

	13	-17	18	-24	25	-64	6	5+	ALL AD	ULTS 18+
STATE	PERCENT	NUMBER								
United States	1.43%	300,100	1.31%	398,900	0.45%	766,500	0.32%	171,700	0.52%	1,337,100
WEST	1.62%	81,700	1.14%	82,600	0.51%	209,400	0.30%	36,400	0.54%	328,500
Alaska	1.23%	500	1.51%	1,000	0.65%	2,500	0.34%	300	0.70%	3,900
Arizona	1.54%	7,300	1.92%	13,000	0.71%	25,200	0.23%	3,000	0.73%	41,200
California	1.93%	49,100	0.70%	25,500	0.50%	105,100	0.34%	19,500	0.49%	150,100
Colorado	1.14%	4,200	2.09%	10,800	0.51%	15,800	0.06%	500	0.60%	27,000
Hawaii	2.15%	1,700	1.50%	1,800	0.66%	4,800	0.44%	1,200	0.70%	7,800
Idaho	0.76%	1,000	0.92%	1,500	0.51%	4,500	0.36%	1,000	0.52%	7,000
Montana	0.78%	500	0.70%	700	0.47%	2,500	0.13%	300	0.41%	3,400
Nevada	1.67%	3,300	0.87%	2,200	0.35%	5,700	0.04%	200	0.34%	8,100
New Mexico	2.62%	3,700	0.81%	1,600	0.62%	6,500	0.73%	2,800	0.67%	10,900
Oregon	1.18%	2,900	1.57%	5,700	0.52%	11,500	0.35%	2,700	0.59%	19,900
Utah	0.83%	2,100	1.34%	4,800	0.47%	7,300	0.43%	1,600	0.60%	13,700
Washington	1.09%	5,000	2.01%	13,300	0.41%	16,900	0.26%	3,200	0.56%	33,300
Wyoming	0.56%	200	1.21%	700	0.41%	1,200	0.29%	300	0.48%	2,100
MIDWEST	1.24%	54,500	1.27%	81,200	0.34%	119,900	0.26%	30,100	0.44%	231,200
Illinois	1.66%	13,700	1.94%	22,300	0.24%	16,300	0.24%	4,800	0.44%	43,400
Indiana	0.91%	4,100	1.18%	7,800	0.45%	15,100	0.27%	2,900	0.50%	25,800
Iowa	1.07%	2,100	0.45%	1,400	0.28%	4,400	0.23%	1,200	0.29%	7,100
Kansas	1.05%	2,100	1.92%	5,700	0.35%	5,000	0.34%	1,600	0.56%	12,400
Michigan	1.41%	8,900	1.13%	10,800	0.38%	19,600	0.14%	2,600	0.42%	33,000
Minnesota	0.94%	3,500	1.62%	7,900	0.52%	15,200	0.32%	2,900	0.60%	26,000
Missouri	0.75%	2,900	0.71%	3,900	0.07%	2,100	0.33%	3,500	0.20%	9,500
Nebraska	0.94%	1,200	1.12%	2,100	0.37%	3,600	0.28%	900	0.45%	6,600
North Dakota	1.16%	500	1.02%	800	0.36%	1,400	0.26%	300	0.43%	2,500
Ohio	1.15%	8,500	1.14%	12,200	0.45%	27,100	0.35%	7,200	0.51%	46,500
South Dakota	0.90%	500	1.12%	900	0.37%	1,600	0.27%	400	0.44%	2,900
Wisconsin	1.75%	6,400	0.99%	5,300	0.29%	8,500	0.17%	1,700	0.34%	15,500
SOUTH	1.25%	102,200	1.33%	154,500	0.45%	295,500	0.36%	73,600	0.54%	523,600
Alabama	1.08%	3,400	1.18%	5,400	0.42%	10,400	0.30%	2,500	0.48%	18,400
Arkansas	0.88%	1,800	3.59%	9,800	0.24%	3,500	0.58%	2,900	0.70%	16,200
Delaware	0.96%	600	2.36%	2,000	0.69%	3,400	0.49%	900	0.82%	6,300
District of Columbia	2.11%	600	2.21%	1,600	0.77%	3,200	0.56%	500	0.92%	5,300
Florida	1.32%	16,200	1.28%	22,400	0.49%	53,900	0.41%	18,600	0.55%	94,900
Georgia	1.18%	8,500	1.24%	12,700	0.48%	26,800	0.61%	9,200	0.60%	48,700
Kentucky	0.68%	2,000	1.27%	5,300	0.43%	9,900	0.32%	2,400	0.51%	17,700
Louisiana	1.30%	4,000	0.79%	3,300	0.45%	10,700	0.23%	1,700	0.44%	15,700
Maryland	2.08%	8,000	1.90%	10,100	0.38%	12,200	0.18%	1,700	0.51%	24,000
Mississippi	1.20%	2,400	0.81%	2,400	0.37%	5,500	0.33%	1,600	0.42%	9,600

	13	-17	18	-24	25	-64	6	5+	ALL AD	ULTS 18+
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
North Carolina	1.27%	8,500	2.46%	24,000	0.73%	38,400	0.53%	8,900	0.87%	71,300
Oklahoma	1.00%	2,600	2.52%	9,300	0.44%	8,500	0.19%	1,100	0.63%	18,900
South Carolina	1.14%	3,700	0.87%	4,100	0.43%	11,300	0.38%	3,500	0.47%	19,000
Tennessee	0.74%	3,100	1.95%	11,700	0.44%	15,000	0.09%	1,000	0.52%	27,700
Texas	1.42%	29,800	0.71%	19,800	0.42%	61,500	0.31%	11,600	0.43%	92,900
Virginia	1.18%	6,200	1.11%	8,800	0.40%	18,000	0.34%	4,600	0.47%	31,400
West Virginia	0.68%	700	1.18%	1,800	0.36%	3,200	0.22%	800	0.40%	5,700
NORTHEAST	1.82%	61,700	1.58%	80,600	0.48%	141,600	0.32%	31,600	0.57%	253,800
Connecticut	1.64%	3,700	1.35%	4,600	0.45%	8,300	0.38%	2,400	0.54%	15,300
Maine	1.59%	1,200	1.44%	1,600	0.47%	3,300	0.34%	1,000	0.53%	5,900
Massachusetts	1.44%	5,900	2.30%	15,700	0.44%	16,100	0.46%	5,400	0.67%	37,100
New Hampshire	0.84%	700	1.53%	1,900	0.48%	3,500	0.34%	900	0.57%	6,300
New Jersey	0.67%	3,800	1.67%	12,700	0.52%	24,800	0.38%	5,600	0.62%	43,100
New York	3.00%	34,800	1.37%	24,100	0.46%	47,600	0.31%	10,100	0.53%	81,800
Pennsylvania	1.30%	10,000	1.50%	16,900	0.51%	33,400	0.24%	5,600	0.55%	56,000
Rhode Island	1.93%	1,200	2.11%	2,300	0.54%	3,000	0.21%	400	0.66%	5,700
Vermont	1.33%	500	1.26%	800	0.48%	1,500	0.29%	400	0.53%	2,700



Table 5 describes the percentage and the population estimate of each racial/ethnic group that identifies as transgender nationally, in the four U.S. regions, and in each state within each region. Due to sample size limitations, our estimates are limited only to adults. Furthermore, we must combine into one heterogenous category all those reporting a race or ethnicity other than White, Black, Asian, and Latinx, which includes Native American, Alaska Native, Native Hawaiian, Pacific Islander, biracial, multiracial, and individuals with other racial/ethnic identities.

Table 5. Regional and state-level estimates of those who identify as transgender in the U.S. population by race/ethnicity (adults ages 18+ only)

	WF	IITE	BL	ACK	ASIAN LATINX		ALL OTHER RACE/ ETHNICITY GROUPS			
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
United States	0.46%	731,200	0.56%	173,500	0.50%	77,300	0.69%	289,700	0.94%	65,400
WEST	0.45%	142,500	0.51%	14,100	0.48%	33,200	0.70%	115,500	0.91%	23,100
Alaska	0.49%	1,900	0.70%	100	0.67%	300	0.78%	300	1.12%	1,200
Arizona	0.52%	18,700	0.66%	1,800	0.63%	1,400	0.91%	15,600	1.17%	3,700
California	0.40%	44,200	0.50%	8,000	0.47%	20,900	0.70%	69,900	0.74%	7,100
Colorado	0.50%	16,200	0.64%	1,100	0.61%	1,000	0.86%	7,500	1.04%	1,300
Hawaii	0.50%	1,400	0.59%	100	0.58%	3,500	0.80%	800	1.08%	1,900
Idaho	0.46%	5,300	0.63%	<100	0.49%	100	0.76%	1,200	0.82%	300
Montana	0.38%	2,800	0.57%	<100	0.38%	<100	0.62%	200	0.68%	400
Nevada	0.39%	3,300	0.50%	700	0.45%	700	0.69%	2,900	0.54%	500
New Mexico	0.47%	3,200	0.63%	200	0.56%	200	0.76%	5,800	0.95%	1,500
Oregon	0.53%	13,700	0.65%	400	0.64%	1,100	0.89%	3,300	1.02%	1,400
Utah	0.54%	9,800	0.66%	100	0.67%	500	0.82%	2,400	1.06%	800
Washington	0.49%	20,300	0.61%	1,400	0.58%	3,400	0.86%	5,400	0.98%	2,900
Wyoming	0.44%	1,700	0.58%	<100	0.59%	<100	0.75%	300	0.85%	100
MIDWEST	0.40%	164,000	0.48%	25,100	0.48%	8,700	0.64%	23,100	0.87%	10,200
Illinois	0.40%	23,900	0.49%	6,300	0.43%	2,400	0.65%	9,400	0.85%	1,400
Indiana	0.46%	19,500	0.53%	2,500	0.56%	700	0.70%	2,200	1.03%	1,000
Iowa	0.31%	5,700	0.41%	300	0.41%	200	0.53%	600	0.56%	200
Kansas	0.49%	8,600	0.60%	800	0.61%	400	0.82%	1,900	1.04%	700
Michigan	0.40%	23,400	0.48%	4,700	0.46%	1,100	0.66%	2,200	0.79%	1,500
Minnesota	0.53%	19,300	0.71%	1,700	0.72%	1,500	0.88%	1,800	1.27%	1,600
Missouri	0.34%	7,300	0.41%	1,200	0.41%	200	0.52%	500	0.37%	400
Nebraska	0.40%	4,800	0.54%	400	0.53%	200	0.71%	1,000	0.89%	300
North Dakota	0.39%	2,000	0.49%	100	0.59%	100	0.74%	200	0.70%	200
Ohio	0.48%	35,400	0.56%	6,000	0.53%	1,200	0.70%	2,100	1.03%	1,900
South Dakota	0.39%	2,200	0.52%	100	0.61%	100	0.63%	100	0.82%	500
Wisconsin	0.35%	11,900	0.48%	1,100	0.47%	600	0.56%	1,300	0.65%	600
SOUTH	0.48%	273,900	0.58%	104,800	0.51%	17,800	0.66%	104,800	0.99%	22,300
Alabama	0.44%	11,200	0.54%	5,400	0.46%	200	0.72%	900	0.80%	600
Arkansas	0.55%	11,200	0.62%	2,600	0.72%	300	0.89%	1,500	1.16%	600
Delaware	0.65%	3,600	0.81%	1,400	0.70%	200	1.15%	800	1.77%	300
District of Columbia	0.77%	1,800	0.99%	2,400	0.98%	300	1.11%	600	1.42%	200
Florida	0.46%	44,300	0.62%	15,100	0.55%	2,700	0.69%	29,500	0.97%	3,300
Georgia	0.53%	23,700	0.61%	15,700	0.57%	2,000	0.84%	5,800	1.04%	1,600
Kentucky	0.49%	14,500	0.55%	1,500	0.53%	300	0.76%	800	1.09%	600
Louisiana	0.43%	8,700	0.51%	5,200	0.50%	300	0.60%	1,000	0.71%	500
Maryland	0.46%	11,200	0.52%	7,200	0.49%	1,500	0.75%	3,200	0.88%	1,100
Mississippi	0.40%	5,100	0.47%	3,800	0.43%	100	0.65%	400	0.77%	200

	WH	HITE	BL	ACK	AS	IAN	LAT	INX	ALL OTH ETHNICIT	HER RACE/ TY GROUPS
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
North Carolina	0.71%	41,400	0.84%	15,700	0.80%	2,100	1.17%	8,200	1.59%	3,800
Oklahoma	0.53%	10,900	0.60%	1,300	0.66%	500	0.88%	2,400	1.00%	3,900
South Carolina	0.43%	11,300	0.53%	5,400	0.49%	300	0.69%	1,300	0.90%	600
Tennessee	0.48%	19,400	0.56%	4,900	0.55%	600	0.81%	1,900	0.96%	900
Texas	0.36%	32,500	0.44%	10,600	0.40%	4,300	0.58%	42,800	0.69%	2,700
Virginia	0.43%	17,900	0.51%	6,300	0.47%	2,100	0.66%	3,700	0.92%	1,500
West Virginia	0.42%	5,200	0.44%	200	0.40%	<100	0.55%	100	0.75%	100
NORTHEAST	0.51%	150,800	0.61%	29,500	0.58%	17,600	0.78%	46,200	1.04%	9,700
Connecticut	0.46%	9,100	0.62%	1,700	0.55%	700	0.76%	3,200	0.96%	600
Maine	0.52%	5,300	0.63%	100	0.74%	100	0.80%	100	0.99%	200
Massachusetts	0.58%	23,900	0.74%	2,800	0.73%	2,800	0.96%	5,800	1.21%	1,800
New Hampshire	0.54%	5,500	0.63%	100	0.60%	200	0.86%	300	1.18%	200
New Jersey	0.49%	20,800	0.61%	5,800	0.52%	3,800	0.79%	11,200	1.11%	1,400
New York	0.46%	39,800	0.56%	12,100	0.55%	7,500	0.70%	19,100	0.92%	3,300
Pennsylvania	0.50%	40,200	0.61%	6,500	0.58%	2,100	0.78%	5,300	1.09%	1,800
Rhode Island	0.57%	3,700	0.71%	300	0.72%	200	0.89%	1,100	1.14%	300
Vermont	0.51%	2,400	0.67%	<100	0.55%	<100	0.91%	100	1.04%	100

Note: White, Black, and Asian are non-Hispanic. The Latinx category includes Hispanic and Latinx people of any race. All other race/ethnicity groups are non-Hispanic.



## CONCLUSION

Based on our estimates from 2016-2017 and the current report, the percentage and number of adults who identify as transgender has remained steady over time in the United States. The availability of the YRBS data has given us a more direct look into youth gender identity and provides better data than was previously available to us for estimating the size and characteristics of the youth population. Youth ages 13 to 17 comprise a larger share of the transgender-identified population than we previously estimated, currently comprising about 18% of the transgender-identified population in the U.S., up from 10% previously. Our findings regarding gender, age, and race/ethnicity are in keeping with existing research, which has found that nonbinary adults comprise nearly a third of transgender adults, transgender people are on average younger than the general population, and transgender people are more likely to report being Latinx and less likely to report being White.

Our estimates described in this report were made possible by advances in gender identity data collection over the past five years. More states have included the BRFSS optional gender identity module over the years and the availability of YRBS data has given us a direct look into youth gender identity. In this study, we were also able, for the first time, to produce national and statelevel population estimates for Asian adults and national population estimates for American Indian and Alaska Native adults who identify as transgender. Despite these advances, our study required the use of advance statistical modeling in order to produce our estimates. This is because several states do not include the optional gender identity module in their BRFSS surveys. Other surveys that identify transgender respondents are still emerging as potential data sources for similar population estimates, like Household Pulse Survey, or do not yet exist. To improve the availability of data about the U.S. transgender population, and negate the need for advanced statistical modeling to overcome limitations in the current data, the CDC should make the BRFSS gender identity module part of the core survey rather than an optional module. Furthermore, the federal government should include questions to identify transgender people in all federal surveys. Visibility for the transgender people in our federal surveys would further bring to light the characteristics, experiences, well-being, and needs of the transgender population in the United States.

### **METHODS**

The BRFSS collects demographic and health information from representative samples at the state level. In addition to a core questionnaire provided by the CDC that coordinates the BRFSS, states can add optional modules that ask unique sets of questions. One module asks about sexual orientation and gender identity (SOGI). Similarly, the YRBS allows states to include a module that asks about SOGI. The BRFSS module asks, "Do you consider yourself to be transgender?" with response options, "Yes; No; Don't know/not sure" or respondents could refuse to answer. If a respondent expresses confusion, then interviewers provide definitions of transgender and/or gender nonconforming. If respondents affirmatively answer the question, they are then asked if they consider themselves to be male-to-female; female-to-male; or gender nonconforming. The YRBS module asks, "Some people describe themselves as transgender when their sex at birth does not match the way they think or feel about their gender. Are you transgender?" with response options, "No; Yes, I am transgender; Not sure if I am transgender, Don't know what the question is asking."

We pool the 2017-2020 BRFSS surveys; 41 states used the SOGI module one or more times in this timeframe (n = 1,707,678). We pool the 2017 and 2019 YRBS where 15 states used the module at least one during this time period (n = 372,214). We analyze adults and youth separately considering they come from different sources. All respondents who were asked whether they identify as transgender are coded as 1 if they did or 0 if they did not, which includes don't know responses, not sure responses, and refusals to answer.

We directly analyze the results from any state that implemented the sexual orientation and gender identity module. For example, the estimates for the 41 states in the BRFSS will be the same as the weighted results one would obtain from direct analyses of available 2017-2020 BRFSS data for that state.<sup>22</sup> The pooled estimates do not account for various years.

The strategy we employ for states where transgender identification is not observed, because the SOGI module was not used, combines small area estimation strategies common in demographic research with poststratification techniques common in survey research.<sup>23</sup> This strategy is called multilevel regression and poststratification (MRP). We fit a multilevel model relying on demographics and state of residence. The general model can be summarized in two stages. The first stage performs a multilevel regression to data. The following is the specification for the BRFSS:

$$y_i = g\Big(b_0 + b_1 * \text{cell\_int} + \alpha_{\text{race}_i}^j + \alpha_{\text{age}_i}^k + \alpha_{\text{educ}_i}^l + \alpha_{\text{age.educ}_i}^m + \alpha_{\text{state}_i}^s\Big).$$

where g(.) is a link function, and  $\alpha$ 's represent random coefficients for demographic and geographic predictors. All demographic random effects are distributed normally,  $\alpha \sim N(0,\sigma^2)$ .

In building our estimation models, we included covariates that are correlated with the percentage of transgender or LGBT people within a state and where there are population estimates from the United States Census Bureau. Individual-level and contextual covariates are related to identification, disclosure, and may be associated with migration to a state. Evaluations of models employing this estimation strategy for statewide estimates show that even using a single demographic predictor, such as race, in addition to geographic predictors produce estimates that out-perform disaggregated analysis.<sup>24</sup> Studies document that LGBT and transgender populations tend to be younger,<sup>25</sup> more

<sup>&</sup>lt;sup>22</sup>This is true for all overall estimates. However, for subgroups we rely on the model described in this note and then generalize those model results to the estimated population total of people who identify as transgender. We do this because of small cell sizes and unstable direct estimates.

<sup>&</sup>lt;sup>23</sup>Park, D.K., Gelman, A., & Bafumi, J. (2004). Bayesian multilevel estimation with poststratification: State-level estimates from national polls. *Political Analysis*, *12*, 375-385.

<sup>&</sup>lt;sup>24</sup>Lax, J. R., and Phillips, J. H. (2009). How should we estimate public opinion in the states? *American Journal of Political Science*, *53*(1), 107-121.

<sup>&</sup>lt;sup>25</sup> James, S. E., Herman, J. L., Rankin, S., Keisling, M., Mottet, L. A., & Anafi, M. (2016). *The Report of the 2015 U.S. Transgender Survey*. Washington, DC: National Center for Transgender Equality; Meyer, I.H., Wilson, B.D.M., & O'Neill, K. (2021). LGBTQ People in the US: Select Findings from the Generations and TransPop Studies. Los Angeles, CA: The Williams Institute.

racially and ethnically diverse,<sup>26</sup> and have levels of educational attainment that differ from non-LGBT<sup>27</sup> or cisgender populations.<sup>28</sup> Further, varying social contexts may create environments that are either more welcoming to LGBT people encouraging greater identity uptake or migration.<sup>29</sup> Thus, the models rely on basic demographics and state-level contextual characteristics that may covary with transgender status.

We use six race and ethnicity categories. We also use 10 age categories ranging from 18 to over 65 years old. Educational attainment is comprised of four categories (i.e., less than a high school diploma or equivalent, a high school diploma or equivalent, some college education, and those with a college degree or more education). We also use the interaction of age and education categories, which is a standard procedure in survey weighting as age and educational attainment are interrelated. At times, the BRFSS module may or may not be used in a cell phone interview depending on a person's residency,<sup>30</sup> so it is used as a covariate to account for a systematic missing data pattern. The geographic-level coefficients are given group-level covariates:

 $\alpha_s \sim N(\alpha_{\text{region}_s}^r + G^s U, \sigma_{\text{state}}^2),$ 

where  $G^s$  is a matrix of  $(s \times j)$  matrix of j group-level variables and U is a vector of length j regression coefficients. We include statewide contextual variables such as race/ethnic composition of the state, the percentage of same-sex couple households in the state, statewide measures of public opinion on LGBT rights, and median income in a state. In total, the percentage of same-sex couple households in the state was among the strongest predictors in the current model. We further add a third level to the model for regional groupings of the states, which is also distributed normally.<sup>31</sup>

The YRBS was analyzed with the same approach, except there were only two age groups (13-14; 15-17), and we do not use educational attainment or cell phone interviews. Our analyses use the sampling weights from both the BRFSS and YRBS. We rescale these weights to account for multilevel modeling using Carle's method A.<sup>32</sup> All models are fit in R relying on maximum likelihood estimation.<sup>33</sup> The second step of MRP is to use the fitted regression and generalize it over known population distributions. For example, if g(.) were a logistic regression, then the probabilities an individual identifies with a group can be predicted for each demographic and geographic characteristic ( $\theta_c$ ),

<sup>&</sup>lt;sup>26</sup> Flores, A. R., Langton, L., Meyer, I. H., and Romero, A. P. (2020). Victimization rates and traits of sexual and gender minorities in the United States: Results from the National Crime Victimization Survey, 2017. *Science Advances, 6*: eaba6910.

<sup>&</sup>lt;sup>27</sup>Ibid.

<sup>&</sup>lt;sup>28</sup>Badgett, M. V. L., Choi, S. K., & Wilson, B. D. M., (2019, October). *LGBT poverty in the United States: A study of differences between sexual orientation and gender identity groups*. Los Angeles, CA: The Williams Institute.

<sup>&</sup>lt;sup>29</sup>Esposito, E., Calanchini, J. (2022). Examining selective migration as attitudinal fit versus gay migration. *Journal of Experimental Social Psychology*, 101, 104307.

<sup>&</sup>lt;sup>30</sup>Jesdale, B.M. (2021). Sources of missing sexual orientation and gender identity data in the Behavioral Risk Factor Surveillance System. *American Journal of Preventative Medicine*, 61(2), 281-290.

<sup>&</sup>lt;sup>31</sup>Given the uniqueness of the District of Columbia, it is treated as its own state and region in this process.

<sup>&</sup>lt;sup>32</sup>Carle, A.C. (2009). Fitting multilevel models in complex survey data with design weights: Recommendations. BMV *Medical Research Methodology*, 9, https://doi.org/10.1186/1471-2288-9-49

<sup>&</sup>lt;sup>33</sup>Bates, D., Máchler, M., Bolker, B., and Walker, S. (2015). Fitting linear mixed-effects models using lme4. *Journal of Statistical Software*, *67*, 1-48.

where max (c) = j \* k \* l \* s. Every fitted value can then be weighted by the size of the population,  $N_c$ , and these weighted values summed by state for population size and further divided by the state's population for a population proportion:

Population size<sub>s</sub> = 
$$\sum_{c \in s} \theta_c * N_c$$
; Population Proportion<sub>s</sub> =  $\frac{\sum_{c \in s} \theta_c * N_c}{\sum_{c \in s} N_c}$ .

We use the 2019 three-year estimates from the American Community Survey for our poststratification dataset, which we retrieved through IPUMS. For the states where data are observed, we multiply the 2019 3-year estimates to the proportion of people identifying as transgender, providing us with a population estimate. For the states where data are not observed, model-based estimates are used, and we incorporate model uncertainty in predictions when providing confidence intervals of our estimates.<sup>34</sup>

Since our estimation strategy produces two sets of estimates for states where data are observed (i.e., direct estimates and model-based estimates). We compared these two sets of estimates. Overall, they tended to strongly correlate with one another (e.g., correlation above 0.80), suggesting that the model-based estimates perform similar to direct estimation. Figure 5 compares model-based estimates to direct estimates at the state level. We see very few deviations that all fall beyond the margin of error. The three exceptions are Missouri and Nevada in the BRFSS and New Jersey in the YRBS, where the direct estimates are smaller than the model-based estimates. These deviations all fall well within confidence intervals. While we report direct estimates whenever possible, these discrepancies suggest that model-based estimates may better adjust weighted estimates to population targets without producing bias. We still opt to be conservative in our reporting and rely on direct estimates whenever the data are available.



Figure 5. Model-based estimates and direct estimates from BRFSS and YRBS

<sup>&</sup>lt;sup>34</sup>There is no consensus about the best method for uncertainty estimation for multilevel models. We use the predictInterval function from the merTools package in R for uncertainty estimation. Ideally, a fully Bayesian model would be preferred, but we were limited by computing power.

To ensure subgroup estimates summed to national estimates, the subgroup counts of people who identify as transgender were divided by total counts of people who identify as transgender and the resulting percentage was then multiplied by the total population estimate to create an adjusted subgroup population estimate. For example, the population estimates of adults who identify as transgender by age group in California were added together to create a population estimate of the total number of adults who identify as transgender in California. The estimated number of 18- to 24-year-old transgender people in California is then divided by this total, to create an estimate of what percentage of transgender adults in California are 18 to 24. This percentage is then multiplied by the total estimate for that subgroup is only slightly different than the original subgroup estimate but it now correctly adds to the total estimated number of adults who identify as transgender in California.

To create national estimates, count estimates for each state were summed and then divided by the total population estimate. For example, the estimated number of Black adults who identify as transgender in the United States was summed across all states and then divided by the total estimated number of Black adults in the U.S. This created a national estimate of the percentage of Black adults who identify as transgender. A similar approach was used to create regional estimates.

All numbers were rounded to the nearest 100th. Some lower-bound credible intervals reported below were negative; these were truncated to zero.

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## APPENDIX

	PERCENT [LB, UB]	NUMBER [LB, UB]
13 to 17	[0.61%, 4.02%]	[128,834, 843,773]
18 to 24	[0.43%, 2.43%]	[130,902, 736,873]
25 to 64	[0.23%, 0.74%]	[399,265, 1,260,344]
65 and older	[0.12%, 0.57%]	[64,824, 310,718]
Total (ages 13+)	[0.26%, 1.14%]	[723,825, 3,151,708]

Table A1. Percent of each age group that identifies as transgender in the U.S.

## Table A2. Percent of each racial/ethnic group that identifies as transgender in the U.S., among adults (ages 18 and older)

	PERCENT [LB, UB]	NUMBER [LB, UB]
White	[0.28%, 0.72%]	[450,300, 1,151,079]
Black	[0.36%, 0.84%]	[110,698, 258,977]
Asian	[0.31%, 0.74%]	[47,451, 113,294]
AIAN	[0.50%, 1.39%]	[8,327, 23,097]
Latinx	[0.41%, 1.00%]	[172,709, 420,079]
Biracial, multiracial, or other race/ethnicity	[0.58%, 1.42%]	[40,459, 98,207]
Total	[0.32%, 0.77%]	[816,644, 1,964,330]

Note: White, Black, Asian, and American Indian or Alaska Native (AIAN) are non-Hispanic. The Latinx category includes Hispanic and Latinx people of any race. Biracial, multiracial, and other race/ethnicity are non-Hispanic.

## Table A3. Percent of each racial/ethnic group that identifies as transgender in the U.S., among youth (ages 13 to 17)

	PERCENT [LB, UB]	NUMBER [LB, UB]
White	[0.34%, 4.63%]	[36,900, 498,000]
Black	[0.38%, 5.05%]	[10,700, 142,250]
Asian	[0.28%, 3.80%]	[2,900, 39,800]
AIAN	[0.48%, 6.46%]	[800, 10,900]
Latinx	[0.49%, 6.34%]	[25,600, 330,650]
Biracial, multiracial, or other race/ethnicity	[0.41%, 5.47%]	[4,000, 53,850]
Total	[0.58%, 3.92%]	[122,000, 823,200]

Note: White, Black, Asian, and American Indian or Alaska Native (AIAN) are non-Hispanic. The Latinx category includes Hispanic and Latinx people of any race. Biracial, multiracial, and other race/ethnicity are non-Hispanic.

Table A4. 95% Credible Intervals for regional and state-level estimates of those who identify as transgender in the U.S. population by age group

	13	3-17	18	-24	2!	5-64	6	5+	ALL A	DULTS
STATE	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]
United States	[0.61%, 4.02%]	[128,834, 843,773]	[0.43%, 2.43%]	[130,902, 736,873]	[0.23%, 0.74%]	[399,265, 1,260,344]	[0.12%, 0.57%]	[64,824, 310,718]	[0.32%, 0.77%]	[816,644, 1,964,330]
WEST	[0.51%, 5.48%]	[25,784,	[0.35%,	[25,647,	[0.18%,	[73,888,	[0.04%,	[4,962, 76,784]	[0.27%,	[162,515,
Alaska	[0.33%,	[143,	[0.00%,	[0,	[0.21%,	[837,	[0.03%,	[26,	[0.31%,	[1,715,
Arizona	4.44%]	[2,040,	3.50%]	[0,	[0.14%,	4,272]	[0.03%,	[398,	[0.30%,	[16,921,
California	5.63%] [0.54%,	26,881] [13,828,	4.14%] [0.14%,	28,838] [5,169,	1.28%] [0.12%,	46,633] [24,372,	0.44%]	5,734] [0,	1.20%] [0.21%,	67,683] [64,328,
California	7.01%]	178,759]	1.25%]	46,288]	0.89%]	187,926]	0.70%]	40,614]	0.77%]	235,869]
Colorado	[0.68%, 1.60%]	[2,484, 5,849]	[1.08%, 3.09%]	[5,686, 16,305]	[0.35%, 0.68%]	[10,898, 21,338]	[0.00%, 0.11%]	[0, 950]	[0.43%, 0.76%]	[19,372, 34,239]
Hawaii	[1.66%, 2.63%]	[1,330, 2,104]	[0.77%, 2.22%]	[905, 2,604]	[0.51%, 0.81%]	[3,698, 5,928]	[0.26%, 0.62%]	[707, 1,668]	[0.56%, 0.83%]	[6,249, 9,262]
Idaho	[0.20%, 2.85%]	[261,	[0.22%,	[362,	[0.25%, 0.77%]	[2,249,	[0.09%, 0.62%]	[262,	[0.33%, 0.72%]	[4,414,
Montana	[0.21%,	[137,	[0.08%,	[76,	[0.31%,	[1,652,	[0.04%,	[87,	[0.29%,	[2,440,
Nevada	[0.93%,	[1,844,	[0.00%,	[0,	[0.16%,	[2,642,	[0.00%,	[0,	[0.16%,	[3,823,
	2.40%]	4,/46]	1.96%]	4,932]	0.53%]	8,772]	0.09%]	466]	0.52%]	12,425]
New Mexico	[0.71%, 9.49%]	[989, 13,308]	[0.00%, 1.74%]	[0, 3,460]	[0.16%, 1.08%]	[1,628, 11,274]	[0.00%, 1.46%]	[0, 5,537]	[0.31%, 1.03%]	[5,032, 16,718]
Oregon	[0.31%, 4.21%]	[778, 10,451]	[0.40%, 5.77%]	[1,457, 21,059]	[0.13%, 2.07%]	[2,897, 45,955]	[0.09%, 1.44%]	[671, 11,073]	[0.15%, 2.33%]	[50, 781]
Utah	[0.22%, 3.02%]	[568, 7,700]	[0.71%, 1.98%]	[2,563, 7,142]	[0.31%, 0.63%]	[4,848, 9,763]	[0.25%, 0.62%]	[899, 2,270]	[0.45%, 0.75%]	[10,244, 17,073]
Washington	[0.29%, 4.06%]	[1,325, 18,761]	[1.41%, 2.62%]	[9,262, 17.293]	[0.31%, 0.51%]	[12,818, 20.840]	[0.15%, 0.37%]	[1,841, 4,471]	[0.46%, 0.65%]	[27,386, 38,698]
Wyoming	[0.15%,	[56,	[0.30%,	[167,	[0.10%,	[302,	[0.07%,	[71,	[0.12%,	[540,
MIDWEST	[0.49%,	[21,739,	[0.42%,	[26,559,	[0.19%,	[67,789,	[0.11%,	[12,382,	[0.27%,	[144,115,
Illinois	3.67%]	[3,836,	[0.42%,	[4,811,	0.54%]	[7,446,	0.45%]	[1,407,	[0.24%,	[23,656,
	5.85%]	48,306]	3.46%]	39,925]	0.38%]	25,144]	0.40%]	8,217]	0.64%]	63,082]
Indiana	[0.24%, 3.42%]	[1,097, 15,534]	[0.44%, 1.92%]	[2,946, 12,738]	[0.28%, 0.61%]	[9,528, 20,945]	[0.12%, 0.43%]	[1,270, 4,662]	[0.35%, 0.65%]	[18,068, 33,554]
lowa	[0.29%, 3.91%]	[586, 7,805]	[0.15%, 0.75%]	[468, 2,364]	[0.19%, 0.38%]	[2,947, 5,947]	[0.11%, 0.35%]	[584, 1,913]	[0.21%, 0.37%]	[5,112, 9,006]
Kansas	[0.28%, 3,90%]	[559, 7.8411	[1.15%, 2.70%]	[3,395, 8.0111	[0.24%, 0,46%]	[3,453, 6.5771	[0.21%, 0.47%]	[993, 2.234]	[0.42%, 0.68%]	[9,294, 15.048]
Michigan	[1.02%, 1.79%]	[6,432, 11,316]	[0.00%, 2.27%]	[33, 21,458]	[0.11%, 0.65%]	[5,797, 33,300]	[0.00%, 0.32%]	[0, 5,577]	[0.19%, 0.64%]	[14,909, 50,221]

	13-17		18-24		25	5-64	6	5+	ALL ADULTS	
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]
Minnesota	[0.25%, 3 32%]	[934, 12 /131	2 08%1	[5,675, 10 1821	[0.42%, 0.62%]	[12,268, 18.075]	[0.22%, 0.42%]	[2,028, 3 8311	[0.52%, 0.69%]	[22,541, 29,910]
	[0 20%	[778	۲0 ۵۵% ۱۵ ۵۵%	۲0,102] ۲۵	[0, 00%	10,075]	0.42 /0j	[/80]	[0,02%	[95/
Missouri	2.70%]	10,548]	2.08%]	11,667]	0.16%]	5,189]	0.62%]	6,555]	0.39%]	18,595]
	[0.25%,	[324,	[0.30%,	[561,	[0.09%,	[909,	[0.07%,	[224,	[0.12%,	[1,694,
Nebraska	3.47%]	4,561]	4.35%]	8,234]	1.52%]	14,575]	1.13%]	3,537]	1.80%]	26,346]
North Dakota	[0.30%,	[127,	[0.25%,	[204,	[0.09%,	[347,	[0.06%,	[76,	[0.11%,	[627,
North Bakota	4.32%]	1,842]	3.93%]	3,144]	1.43%]	5,489]	1.02%]	1,229]	1.69%]	9,862]
Ohio	[0.30%,	[2,242,	[0.62%,	[6,661,	[0.33%,	[19,847,	[0.22%,	[4,536,	[0.40%,	[36,471,
	4.31%]	31,883]	1.66%]	17,749]	0.57%]	34,509]	0.48%]	9,844]	0.61%]	55,618]
South Dakota	[0.24%, 2.21%]	[141, 1 9751	[0.29%,	[238, 2 5001	[0.09%, 1.51%]	[409, 6 526]	[0.07%, 1 1 2%]	[110, 1 72/1	[0.11%, 1.77%]	[757,
	[1 200%	[/ 692	4.55%J	[1 569	[0 16%	[0,000 200 NJ	[0 07%	[675	[0 220%	[10.022
Wisconsin	2.21%]	[4,083, 8,050]	1.68%]	9,1551	0.41%]	12,3371	0.27%	2,7971	0.46%]	20.9791
	[0.53%,	[42,806,	[0.45%,	[51,865,	[0.27%,	[176,871,	[0.16%,	[33,661,	[0.35%,	[343,999,
SOUTH	3.68%]	299,986]	2.50%]	290,313]	0.73%]	475,755]	0.62%]	128,183]	0.82%]	793,395]
Alabama	[0.30%,	[956,	[0.31%,	[1,391,	[0.10%,	[2,619,	[0.08%,	[657,	[0.12%,	[4,667,
Alaballia	3.99%]	12,593]	4.55%]	20,700]	1.66%]	41,531]	1.20%]	10,233]	1.90%]	72,464]
Arkansas	[0.24%,	[471,	[0.00%,	[0,	[0.03%,	[392,	[0.12%,	[618,	[0.17%,	[3,943,
	3.37%]	6,712]	7.89%]	22,365]	0.45%]	6,878]	1.04%]	5,458]	1.20%]	27,831]
Delaware	[0.51%,	[305, 843]	[0.95%,	[796,	[0.42%,	[2,077,	[0.18%,	[335,	[0.58%,	[4,465,
District of	1.40%]	[120	5.70%J	5,155]	0.97%]	4,827]	0.79%]	[1,501]	1.10%]	0,400J
Columbia	[0.46%, 9.29%]	2.6031	[0.54%, 8.51%]	[392, 6.156]	[0.18%, 3.14%]	[775, 13.125]	2.20%]	1.9271	[0.22%, 3.67%]	21.2071
	[0.97%,	[11,898,	[0.33%,	[5,791,	[0.32%,	[34,691,	[0.25%,	[11,041,	[0.40%,	[68,989,
Florida	1.67%]	20,515]	2.23%]	39,269]	0.67%]	73,562]	0.58%]	26,257]	0.70%]	120,730]
Goorgia	[0.32%,	[2,307,	[0.38%,	[3,869,	[0.30%,	[16,445,	[0.32%,	[4,878,	[0.43%,	[34,896,
Georgia	4.54%]	32,790]	2.10%]	21,625]	0.67%]	37,242]	0.89%]	13,621]	0.77%]	62,489]
Kentucky	[0.18%,	[517,	[0.31%,	[1,300,	[0.11%,	[2,505,	[0.09%,	[653,	[0.13%,	[4,457,
-	2.68%]	7,813]	4.83%]	20,252]	1.72%]	39,533]	1.32%]	9,997]	2.01%]	69,781]
Louisiana	[0.35%, 4 77%]	[1,062, 14,546]	[0.13%, 1.44%]	[550, 6 102]	[0.27%,	[6,464, 15 2991	[0.08%, 0.27%]	[569, 2 7761	[0.29%, 0.59%]	[10,334,
	4.77%J	[7 507	۲.44%] ۲۰ ۹۱%	[/ 803	[0.26%	[8 264	[0.37%]	2,770]	0.39%]	[17 ///
Maryland	2.22%]	[7,507, 8,542]	2.89%]	[ <del>4</del> ,803, 15,160]	0.50%]	[6,20 <del>4</del> , 16,046]	0.26%]	2,506]	0.65%]	30,644]
	[0.31%,	[627,	[0.16%,	[463,	[0.16%,	[2,411,	[0.10%,	[474,	[0.25%,	[5,695,
Mississippi	4.52%]	9,213]	1.47%]	4,385]	0.57%]	8,575]	0.56%]	2,746]	0.58%]	13,211]
North Carolina	[0.36%,	[2,413,	[1.42%,	[14,413,	[0.52%,	[28,416,	[0.31%,	[5,355,	[0.68%,	[55,724,
North Carolina	4.69%]	31,369]	3.50%]	35,472]	0.95%]	51,386]	0.75%]	13,123]	1.05%]	86,044]
Oklahoma	[0.27%,	[691,	[1.36%,	[5,236,	[0.30%,	[6,038,	[0.06%,	[381,	[0.46%,	[13,830,
	3.63%]	9,438]	3.68%]	14,186]	0.58%]	11,532]	0.32%]	1,999]	0.80%]	24,053]
South Carolina	[0.30%,	[975, 12 7001	[0.25%,	[1,186, 7,0021	[0.23%,	[6,084, 16 6921	0.23%,	[2,186,	[0.32%,	[12,923,
	4.28%)	[5,/60] [000	[0 07%	[۲۹۱۵ ۱/۱۵	[0.120/	[6 525	[0,00%	4,932]	[0.25%]	[12 204
Tennessee	2.79%]	11,8161	.0.07%, 3.84%1	24,0841	0.70%1	25,0201	0.18%1	2,0861	0.78%1	41,4841
		-	-	-	-	-	-	-	-	-

	13	-17	18-24		2	5-64	65+		ALL ADULTS	
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
	[LB, UB]	[LB, UB]								
Texas	[0.37%,	[7,732,	[0.27%,	[7,577,	[0.26%,	[38,793,	[0.08%,	[3,139,	[0.30%,	[64,803,
	5.07%]	106,687]	1.15%]	32,579]	0.57%]	85,989]	0.55%]	20,418]	0.56%]	120,966]
Virginia	[0.80%,	[4,225,	[0.40%,	[3,198,	[0.28%,	[12,515,	[0.15%,	[2,009,	[0.35%,	[23,377,
	1.55%]	8,149]	1.82%]	14,624]	0.53%]	23,842]	0.54%]	7,290]	0.60%]	40,074]
West Virginia	[0.16%,	[168,	[0.32%,	[489,	[0.20%,	[1,851,	[0.08%,	[299,	[0.27%,	[3,870,
	2.47%]	2,569]	2.05%]	3,107]	0.51%]	4,696]	0.36%]	1,316]	0.55%]	7,884]
NORTHEAST	[1.14%,	[38,504,	[0.53%,	[26,831,	[0.27%,	[80,717,	[0.14%,	[13,818,	[0.37%,	[166,015,
	3.10%]	104,777]	2.78%]	141,561]	0.74%]	218,410]	0.55%]	53,622]	0.82%]	365,516]
Connecticut	[0.44%,	[980,	[0.54%,	[1,882,	[0.31%,	[5,789,	[0.20%,	[1,267,	[0.40%,	[11,351,
	5.87%]	13,222]	2.15%]	7,435]	0.59%]	10,968]	0.55%]	3,475]	0.68%]	19,297]
Maine	[1.39%,	[1,021,	[0.36%,	[386,	[0.12%,	[849,	[0.09%,	[254,	[0.14%,	[1,489,
	1.80%]	1,322]	5.00%]	5,407]	1.87%]	13,159]	1.28%]	3,679]	2.03%]	22,246]
Massachusetts	[0.38%,	[1,571,	[0.69%,	[4,792,	[0.20%,	[7,444,	[0.12%,	[1,411,	[0.41%,	[22,723,
	5.36%]	21,958]	3.90%]	26,922]	0.68%]	24,975]	0.81%]	9,457]	0.93%]	51,543]
New Hampshire	[0.22%,	[177,	[0.36%,	[443,	[0.12%,	[877,	[0.09%,	[225,	[0.14%,	[1,545,
	3.01%]	2,414]	5.78%]	7,157]	1.90%]	13,793]	1.38%]	3,478]	2.21%]	24,427]
New Jersey	[0.19%,	[1,056,	[0.31%,	[2,356,	[0.22%,	[10,185,	[0.16%,	[2,433,	[0.36%,	[25,018,
	1.15%]	6,521]	3.03%]	22,910]	0.83%]	39,143]	0.59%]	8,681]	0.88%]	61,156]
New York	[2.28%,	[26,448,	[0.79%,	[13,832,	[0.37%,	[37,926,	[0.19%,	[6,302,	[0.43%,	[66,374,
	3.72%]	43,209]	1.96%]	34,452]	0.55%]	57,554]	0.43%]	14,018]	0.62%]	95,703]
Pennsylvania	[0.78%,	[5,987,	[0.16%,	[1,818,	[0.22%,	[14,634,	[0.07%,	[1,617,	[0.31%,	[31,543,
	1.82%]	14,014]	2.84%]	32,295]	0.79%]	52,649]	0.40%]	9,626]	0.79%]	80,383]
Rhode Island	[1.32%,	[828,	[0.95%,	[1,043,	[0.35%,	[1,977,	[0.07%,	[139,	[0.47%,	[4,029,
	2.54%]	1,593]	3.28%]	3,613]	0.73%]	4,096]	0.35%]	647]	0.85%]	7,286]
Vermont	[1.21%,	[435,	[0.43%,	[279,	[0.32%,	[1,036,	[0.14%,	[169,	[0.38%,	[1,942,
	1.45%]	524]	2.10%]	1,371]	0.65%]	2,073]	0.45%]	560]	0.68%]	3,475]

Table A5. 95% Credible Intervals for regional and state-level estimates of adults who identify as transgender in the U.S. by race/ethnicity

	WHITE		BLACK		ASIAN		LATINX		ALL OTHER RACE/ ETHNICITY GROUPS	
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]	[LB, UB]
United States	[0.28%,	[450,300,	[0.36%,	[110,698,	[0.31%,	[47,451,	[0.41%,	[172,709,	[0.58%,	[40,459,
	0.72%]	1,151,079]	0.84%]	258,977]	0.74%]	113,294]	1.00%]	420,079]	1.42%]	98,207]
WEST	[0.24%,	[77,004,	[0.25%,	[6,967,	[0.25%,	[17,511,	[0.33%,	[53,629,	[0.49%,	[12,378,
	0.76%]	243,246]	0.81%]	22,361]	0.74%]	51,508]	1.12%]	184,482]	1.45%]	37,047]
Alaska	[0.12%,	[855,	[0.17%,	[57,	[0.17%,	[144,	[0.19%,	[133,	[0.49%,	[526,
	1.92%]	3,045]	2.68%]	202]	2.59%]	501]	2.90%]	459]	1.76%]	1,878]
Arizona	[0.13%,	[7,583,	[0.17%,	[708,	[0.16%,	[555,	[0.24%,	[6,590,	[0.47%,	[1,485,
	2.03%]	31,021]	2.54%]	2,866]	2.40%]	2,252]	3.49%]	25,602]	1.89%]	5,942]
California	[0.10%,	[19,339,	[0.13%,	[3,503,	[0.12%,	[9,258,	[0.17%,	[29,094,	[0.33%,	[3,135,
	1.58%]	69,353]	2.03%]	12,883]	1.85%]	32,861]	2.76%]	109,835]	1.15%]	10,936]
Colorado	[0.13%,	[11,741,	[0.15%,	[744,	[0.16%,	[691,	[0.22%,	[5,262,	[0.76%,	[934,
	2.02%]	20,909]	2.45%]	1,376]	2.36%]	1,201]	3.28%]	9,172]	1.28%]	1,581]
Hawaii	[0.13%,	[1,152,	[0.15%,	[104,	[0.15%,	[2,815,	[0.20%,	[654,	[0.86%,	[1,524,
	1.97%]	1,675]	2.34%]	155]	2.34%]	4,269]	3.09%]	946]	1.25%]	2,216]
Idaho	[0.11%,	[3,357,	[0.16%,	[29,	[0.12%,	[60,	[0.19%,	[746,	[0.53%,	[223,
	1.76%]	7,392]	2.47%]	63]	1.94%]	137]	2.82%]	1,555]	1.16%]	484]
Montana	[0.09%,	[1,968,	[0.15%,	[16,	[0.10%,	[19,	[0.17%,	[131,	[0.49%,	[305,
	1.50%]	3,707]	2.12%]	28]	1.50%]	35]	2.43%]	225]	0.88%]	548]
Nevada	[0.10%,	[1,547,	[0.13%,	[352,	[0.11%,	[329,	[0.17%,	[1,352,	[0.26%,	[243,
	1.52%]	5,032]	1.93%]	1,111]	1.74%]	1,052]	2.71%]	4,451]	0.82%]	778]
New Mexico	[0.12%,	[1,483,	[0.15%,	[97,	[0.14%,	[80,	[0.19%,	[2,671,	[0.45%,	[701,
	1.83%]	5,024]	2.45%]	338]	2.18%]	271]	2.83%]	8,773]	1.48%]	2,313]
Oregon	[0.13%,	[3,463,	[0.16%,	[93,	[0.16%,	[276,	[0.22%,	[836,	[0.25%,	[357,
	2.06%]	53,887]	2.53%]	1,454]	2.51%]	4,275]	3.47%]	12,993]	3.91%]	5,477]
Utah	[0.13%,	[7,306,	[0.17%,	[114,	[0.17%,	[412,	[0.21%,	[1,855,	[0.78%,	[556,
	2.07%]	12,214]	2.47%]	181]	2.58%]	677]	3.15%]	3,035]	1.36%]	966]
Washington	[0.12%,	[16,788,	[0.15%,	[1,144,	[0.15%,	[2,868,	[0.20%,	[4,228,	[0.81%,	[2,358,
	1.87%]	23,459]	2.36%]	1,604]	2.18%]	3,884]	3.33%]	6,304]	1.18%]	3,447]
Wyoming	[0.11%,	[422,	[0.15%,	[6,	[0.15%,	[6,	[0.19%,	[76,	[0.22%,	[31,
	1.71%]	6,526]	2.32%]	100]	2.36%]	92]	2.87%]	1,132]	3.36%]	480]
MIDWEST	[0.25%,	[103,416,	[0.29%,	[15,082,	[0.30%,	[5,418,	[0.38%,	[13,844,	[0.54%,	[6,356,
	0.60%]	245,223]	0.68%]	35,880]	0.70%]	12,613]	0.95%]	34,444]	1.35%]	15,921]
Illinois	[0.10%,	[13,094,	[0.12%,	[3,432,	[0.11%,	[1,283,	[0.16%,	[5,044,	[0.49%,	[802,
	1.60%]	35,165]	1.95%]	9,223]	1.70%]	3,432]	2.51%]	13,364]	1.16%]	1,898]
Indiana	[0.12%,	[13,594,	[0.13%,	[1,727,	[0.15%,	[541,	[0.18%,	[1,547,	[0.70%,	[658,
	1.75%]	25,148]	2.11%]	3,333]	2.27%]	1,007]	2.65%]	2,778]	1.37%]	1,288]
lowa	[0.08%,	[4,140,	[0.11%,	[235,	[0.10%,	[154,	[0.14%,	[430,	[0.42%,	[152,
	1.20%]	7,333]	1.59%]	398]	1.56%]	271]	2.10%]	742]	0.71%]	261]
Kansas	[0.12%,	[6,458,	[0.15%,	[559,	[0.15%,	[300,	[0.21%,	[1,447,	[0.77%,	[530,
	1.83%]	10,452]	2.33%]	944]	2.40%]	510]	3.07%]	2,269]	1.26%]	873]

	WHITE		BLACK		AS	IAN	LAT	INX	ALL OTHER RACE/ ETHNICITY GROUPS	
STATE	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]	PERCENT [LB, UB]	NUMBER [LB, UB]
Michigan	[0.10%, 1.58%]	[10,596, 35,680]	[0.12%, 1.89%]	[2,129, 7,240]	[0.12%, 1.82%]	[528, 1,765]	[0.16%, 2.50%]	[960, 3,234]	[0.36%, 1.19%]	[697, 2,302]
Minnesota	[0.14%, 2.10%]	[16,873, 22,434]	[0.18%, 2.73%]	[1,510, 1,961]	[0.18%, 2.76%]	[1,281, 1,734]	[0.23%, 3.46%]	[1,510, 2,009]	[1.08%, 1.40%]	[1,368, 1,772]
Missouri	[0.08%, 1.40%]	[723, 14,324]	[0.10%, 1.59%]	[121, 2,219]	[0.10%, 1.57%]	[24, 449]	[0.13%, 2.06%]	[49, 930]	[0.04%, 0.70%]	[36, 674]
Nebraska	[0.10%, 1.63%]	[1,238, 19,344]	[0.13%, 2.14%]	[88, 1,393]	[0.13%, 2.12%]	[49, 784]	[0.18%, 2.74%]	[246, 3,692]	[0.22%, 3.41%]	[74, 1,134]
North Dakota	[0.10%, 1.54%]	[492, 7,765]	[0.12%, 1.92%]	[18, 291]	[0.15%, 2.27%]	[17, 257]	[0.19%, 2.87%]	[39, 596]	[0.17%, 2.73%]	[61, 952]
Ohio	[0.12%, 1.87%]	[27,892, 42,266]	[0.14%, 2.15%]	[4,542, 7,125]	[0.13%, 2.11%]	[859, 1,414]	[0.18%, 2.78%]	[1,689, 2,593]	[0.82%, 1.22%]	[1,488, 2,220]
South Dakota	[0.10%, 1.59%]	[575, 9,025]	[0.13%, 2.00%]	[18, 276]	[0.15%, 2.36%]	[14, 225]	[0.16%, 2.47%]	[34, 522]	[0.20%, 3.14%]	[115, 1,812]
Wisconsin	[0.09%, 1.39%]	[7,739, 16,287]	[0.12%, 1.83%]	[704, 1,475]	[0.12%, 1.90%]	[367, 764]	[0.14%, 2.15%]	[850, 1,717]	[0.42%, 0.83%]	[374, 736]
SOUTH	[0.30%, 0.76%]	[174,367, 433,893]	[0.38%, 0.90%]	[68,709, 161,966]	[0.35%, 0.72%]	[12,221, 25,405]	[0.46%, 0.88%]	[73,399, 140,419]	[0.67%, 1.40%]	[15,303, 31,712]
Alabama	[0.11%, 1.75%]	[2,918, 44.892]	[0.13%, 2.08%]	[1,307, 20,777]	[0.11%, 1.85%]	[60, 970]	[0.18%, 2.77%]	[236, 3.612]	[0.21%, 3.14%]	[145, 2.213]
Arkansas	[0.14%,	[2,728, 19,259]	[0.16%, 2.49%]	[625, 4,448]	[0.18%,	[83, 580]	[0.22%,	[362, 2,534]	[0.28%,	[146, 1.009]
Delaware	[0.17%,	[2,553,	[0.20%,	[999,	[0.17%,	[162,	[0.29%,	[545,	[1.26%,	[205,
District of Columbia	[0.18%,	[426,	[0.24%,	[586,	[0.23%, 4 23%]	[61,	[0.27%,	[157,	[0.35%,	[55,
Florida	[0.12%,	[32,116,	[0.15%,	[10,771,	[0.14%,	[1,978,	[0.18%,	[21,699,	[0.73%,	[2,424,
Georgia	[0.13%,	[16,907,	[0.15%,	[11,308,	[0.15%,	[1,474,	[0.21%,	[4,031,	[0.78%,	[1,175,
Kentucky	[0.12%,	[3,654,	[0.14%,	[387,	[0.13%,	[72,	[0.19%,	[199,	[0.28%,	[146,
Louisiana	[0.11%,	[5,647,	[0.13%,	[3,538,	[0.13%,	[189,	[0.15%,	[635,	[0.48%,	[325,
Maryland	[0.11%,	[8,104,	[0.13%,	[5,198,	[0.12%,	[1,079,	[0.19%,	[2,298,	[0.64%,	[764,
Mississippi	[0.10%,	[3,002,	[0.12%,	[2,273,	[0.11%,	[54,	[0.16%,	[222,	[0.47%,	[144,
North Carolina	[0.18%,	[32,262,	[0.22%,	[12,387,	[0.20%,	[1,645,	[0.30%,	[6,406,	[1.27%,	[3,024,
Oklahoma	[0.13%,	49,657] [7,960,	[0.16%,	[961,	[0.17%,	[343,	4.41%]	9,643] [1,749,	[0.72%,	4,397] [2,818,
South Carolina	2.09%] [0.11%, 1.64%]	[7,647, 14,681]	2.36%] [0.13%, 2.10%]	[3,701, 7,334]	2.55%] [0.12%, 1.86%]	584] [229, 442]	5.48%] [0.18%, 2.70%]	3,065] [916, 1,759]	[0.63%, 1.21%]	4,739] [430, 823]

	WHITE		BLACK		AS	SIAN	LAT	ΓΙΝΧ	ALL OTHER RACE/ ETHNICITY GROUPS	
STATE	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER	PERCENT	NUMBER
	[LB, UB]	[LB, UB]								
Tennessee	[0.12%,	[9,335,	[0.14%,	[2,312,	[0.13%,	[257,	[0.21%,	[952,	[0.48%,	[440,
	1.90%]	29,154]	2.29%]	7,483]	2.15%]	817]	3.07%]	2,757]	1.39%]	1,274]
Texas	[0.09%,	[22,375,	[0.11%,	[7,461,	[0.10%,	[2,997,	[0.15%,	[30,120,	[0.48%,	[1,850,
	1.40%]	41,846]	1.73%]	13,921]	1.61%]	5,679]	2.30%]	56,217]	0.85%]	3,304]
Virginia	[0.11%,	[13,200,	[0.13%,	[4,747,	[0.11%,	[1,506,	[0.17%,	[2,811,	[0.69%,	[1,113,
	1.66%]	22,700]	1.95%]	7,973]	1.85%]	2,721]	2.62%]	4,811]	1.15%]	1,869]
West Virginia	[0.10%,	[3,532,	[0.10%,	[148,	[0.10%,	[30,	[0.14%,	[62,	[0.52%,	[99,
	1.58%]	7,157]	1.75%]	328]	1.60%]	66]	2.25%]	132]	1.07%]	202]
NORTHEAST	[0.32%,	[95,512,	[0.41%,	[19,939,	[0.41%,	[12,302,	[0.54%,	[31,838,	[0.69%,	[6,423,
	0.77%]	228,717]	0.80%]	38,770]	0.79%]	23,768]	1.03%]	60,733]	1.44%]	13,528]
Connecticut	[0.12%,	[6,772,	[0.15%,	[1,234,	[0.14%,	[546,	[0.19%,	[2,380,	[0.72%,	[419,
	1.84%]	11,623]	2.35%]	2,130]	2.14%]	909]	2.93%]	3,936]	1.21%]	700]
Maine	[0.13%,	[1,350,	[0.16%,	[19,	[0.18%,	[25,	[0.20%,	[34,	[0.25%,	[60,
	1.95%]	20,093]	2.39%]	295]	2.88%]	399]	3.13%]	526]	3.89%]	933]
Massachusetts	[0.15%,	[14,764,	[0.18%,	[1,697,	[0.18%,	[1,696,	[0.24%,	[3,514,	[0.72%,	[1,052,
	2.32%]	33,486]	2.86%]	3,818]	2.80%]	3,831]	3.79%]	8,027]	1.64%]	2,382]
New Hampshire	[0.13%,	[1,344,	[0.16%,	[22,	[0.15%,	[45,	[0.22%,	[83,	[0.30%,	[53,
	2.13%]	21,355]	2.52%]	342]	2.28%]	683]	3.36%]	1,251]	4.48%]	796]
New Jersey	[0.12%,	[12,037,	[0.15%,	[3,455,	[0.13%,	[2,255,	[0.19%,	[6,451,	[0.65%,	[819,
	1.90%]	29,622]	2.41%]	8,423]	2.11%]	5,651]	2.98%]	15,533]	1.53%]	1,927]
New York	[0.11%,	[32,028,	[0.14%,	[9,675,	[0.14%,	[6,346,	[0.18%,	[15,592,	[0.75%,	[2,733,
	1.79%]	46,924]	2.16%]	13,955]	2.17%]	8,788]	2.73%]	22,256]	1.04%]	3,780]
Pennsylvania	[0.13%,	[22,840,	[0.15%,	[3,566,	[0.14%,	[1,191,	[0.20%,	[2,948,	[0.59%,	[998,
	1.95%]	57,720]	2.41%]	9,310]	2.31%]	3,135]	3.13%]	7,707]	1.50%]	2,511]
Rhode Island	[0.14%,	[2,641,	[0.18%,	[245,	[0.18%,	[163,	[0.22%,	[773,	[0.83%,	[206,
	2.19%]	4,781]	2.76%]	449]	2.90%]	311]	3.36%]	1,385]	1.45%]	359]
Vermont	[0.13%,	[1,735,	[0.16%,	[26,	[0.14%,	[34,	[0.22%,	[63,	[0.77%,	[84,
	2.05%]	3,114]	2.69%]	48]	2.20%]	60]	3.58%]	113]	1.29%]	141]

Note: White, Black, and Asian are non-Hispanic. The Latinx category includes Hispanic and Latinx people of any race. All other race/ethnicity groups are non-Hispanic.