



**Racism Creates
Inequities in Maternal
and Child Health,
Even Before Birth**



Make their potential our priority.

The State of Babies Yearbook: 2021 was produced as part of ZERO TO THREE's *Think Babies*[™], with data and indicator analysis powered by Child Trends. Funding partners for the 2021 *Yearbook* include the Perigee Fund and the Tikun Olam Foundation. Data provided by this effort are examined in this brief to better understand the inequities that begin before birth for both infants and mothers.

July 2021 correction note: On page 14, the authors removed language referring to a specific group prenatal care model but added a reference to a pilot evaluation of this model in our description of what group prenatal care can achieve. We also modified the citations associated with these sentences.

Authors: Andra Wilkinson,** Jessie Laurore,** Emily Maxfield,** Esther Gross,** Sarah Daily,** and Kim Keating*



Acknowledgements

Writing this brief was a team effort, so we'd like to thank our partners who helped us think more intentionally about centering equity in our framing. We are grateful to our colleagues at Child Trends for their guidance, review, and support during the development of the brief, including Deana Around Him, Elizabeth Jordan, Renee Ryberg, Phoebe Harris, and Lisa Kim. We also appreciate Patricia Cole at ZERO TO THREE for her review and support of this work. Finally, thank you to the authors of the previous version of this brief, on which we built—especially David Murphey.



Introduction

The *State of Babies Yearbook* aims to bridge the gap between science and policy with national and state-by-state data on the well-being of America’s babies. The data are clear: The state in which a baby is born makes a big difference in their chance for a strong start in life. However, location is only one factor to consider in ensuring that our youngest children have a healthy start.

Another critical factor is the influence of race, ethnicity, and racism on the quality of care that parents and babies receive. Wherever possible, the *State of Babies Yearbook* disaggregates national and state averages for key indicators of infant well-being by race/ethnicity^a to explore disparities and better identify areas that warrant further examination and action.

Whether babies are born healthy and with the potential to thrive as they grow greatly depends on their mother’s/birthing person’s well-being—not just before birth, but even prior to conception. To have a healthy pregnancy and positive birth outcomes, mothers require access to appropriate health care services before, during, and after pregnancy. The well-being of mothers and babies are intrinsically interdependent, although they are often considered separately. The connection between maternal and child well-being is particularly important among women of color and their babies due to the intergenerational effects of and lived experiences with institutional and interpersonal racism. Racism influences maternal health before and throughout pregnancy and affects babies’ starts in life. Institutional and interpersonal racism are pervasive and present in the policies, practices, and systems of care that families of color encounter.

Institutionalized racism refers to policies, practices, and norms that limit access by race/ethnicity to societal opportunities, goods, and services. These policies, practices, or norms may be legalized and may result in generational impacts.^a An example of institutionalized racism is the practice of redlining in the 1950s, by which majority-Black neighborhoods were systematically denied access to home loans. The influence of redlining persists to this day, with formerly redlined districts continuing to experience economic inequality.^b

Interpersonal racism refers to individual discriminatory actions toward others based on their race/ethnicity, as well as beliefs held by individuals about the abilities, experiences, or intentions of others based on their race/ethnicity.^c For example, many White members of the medical field hold false beliefs about biological differences between Black and White patients, including the belief that Black patients do not experience as much pain as White patients and therefore do not need as much pain medication.^d

Birthing person is inclusive of people who do not identify with terms like women or mother. We try to be as inclusive as possible while keeping the pronouns of study participants. Similarly, we know that terms like “chestfeeding” are more inclusive, but kept the terms used in the data.

^a<https://pdfs.semanticscholar.org/72d4/f329a003af893bdb548fa7fecdc0145fc01.pdf>; ^b<https://ncrc.org/holc/>; ^c<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1446334/pdf/10936998.pdf>; ^d<https://www.pnas.org/content/113/16/4296>

^a Race and ethnicity are distinct parts of identity and we refer to them separately when feasible. However, we often use this combined term as it matches the data, which usually groups them together. Hispanic people include people of all races and other racial categories include only non-Hispanic people.

In addition to disparities in maternal and child health within the United States, the nation stands alone among its peers in markers of maternal and child health: The United States is the only high-income country in which the maternal mortality rate has risen over the past two decades.¹ Relatedly, the United States has a shortage of maternity care providers (Ob/Gyns and midwives),^b an overrepresentation of Ob/Gyns to midwives,^c no paid family leave, and inadequate postpartum support (e.g., home visits).² Similarly, the overall infant mortality rate in the United States is twice the rate in the European Union, on average; for Black infants in the United States, the infant mortality is nearly four times the overall rate in the European Union.^{3,4}

To inform maternal and child health policy and practice, this brief applies a racial and ethnic equity lens to the review of data from the [State of Babies Yearbook: 2021](#). Specifically, this brief aims to explore *why* there are disparities in maternal and child health; *what* disparities exist, and for whom; and *how* policymakers and practitioners can promote racial and ethnic equity to improve maternal and child health. We use racial and ethnic equity to refer to the process of involving those most impacted by institutional racism in the creation and implementation of policies and practices that impact their lives, and to outcomes in which race and ethnicity do not predict a person's life course.⁵ This approach offers recommendations that are discussed in detail in the Recommendations section.

Recommendations for policymakers and practitioners to promote equity and improve maternal and child health

- Increase support and access to culturally responsive promising models (e.g., midwifery, doula care, group prenatal care, and breastfeeding support).
- Expand Medicaid coverage through the first year postpartum.
- Remove administrative and other barriers to support participation in the Women, Infants, and Children (WIC) nutrition program.
- Expand access to paid family leave.

Using equitable research communications guidance

In the spring of 2020, ZERO TO THREE and Child Trends released [Maternal and Child Health Inequities Emerge Even Before Birth](#). In that report, we made important connections between systemic racism and maternal, infant, and toddler outcomes. As researchers, we work to continuously improve our understanding of the impact of institutional and interpersonal racism on outcomes for children and families and to consider how we communicate that impact in our work. This brief uses the latest data available, and we have worked to equitably communicate data by race and ethnicity by relying on guidance from two Child Trends publications that focus on equitable research and communication: *How to Embed a Racial and Ethnic Equity Perspective in Research*⁶ and *Equitable Research Communication Guidelines*.⁷ Here are the highlights of the guidance we relied on:

^b Obstetricians and gynecologists (Ob/Gyns) are medical doctors; midwives can have varying levels of training but are commonly nurses with additional graduate training in midwifery.

^c Midwives are associated with lower costs and similar or better outcomes compared to Ob/Gyns for uncomplicated births.

Say what you mean. When communicating research findings, precisely define the study population rather than use euphemisms (e.g., “diverse”). As researchers, we should ask ourselves who our research is about and whether the language used in the findings may render some groups invisible. For example, avoid using “people of color” if only one race is represented in the study population; instead, name the specific race or ethnicity included in the study population. In addition, saying what one means may reveal limitations in the data that one is using. For example, the data may only include whether participants identify as “Hispanic or Latino,” and may not specify country of origin. If unable to add details about the target population because of the way the data were collected, researchers should share those limitations when reporting findings.

Avoid labeling people with stigmatized, or temporary, circumstances. For example, rather than saying “at-risk families,” describe the circumstances that they are in. It is important to engage and elevate the voices of community stakeholders when deciding what language is respectful to that community. Sometimes people prefer identity-first language (e.g., Black person, disabled person), especially if they consider the characteristic part of their identities. When there is no clear agreement on respectful language, researchers can use more than one term and explain their rationale for doing so.

Do not assume differences by race, ethnicity, or other groupings. There are no biological differences between socially constructed racial groups. Researchers may inadvertently reify socially constructed categories, stereotypes, and common misconceptions through their research, depending on how they make or suggest comparisons. To avoid doing so, try to avoid making assumptions of differences by groups in the absence of racism. In addition, take care not to make White the referent group or norm when making comparisons or without providing context and discussion about the impact of racism. Similarly, we explore aspects of equity in the data visualization used in this brief and try to avoid sending inadvertent messages with the colors we choose. For example, colors like red can be associated with negative attributes, while blue or green is often used to communicate about positive attributes.

Acknowledge intersectionality and within-group differences. Individuals can experience different forms of racism or discrimination that can have compounding or overlapping impacts. Consider a wealthy, 50-year-old, Black, disabled, and bisexual woman. She may experience discrimination because of her race, disability, gender, age, and sexual orientation, but also experience advantages because of her socioeconomic status. Everyone has multiple identities that may impact their experiences simultaneously. To examine data in context, these intersections of experiences must be acknowledged. Individuals’ experiences are complex and unique; therefore, researchers cannot treat marginalized groups as monolithic. For example, most Black families are not low-income and yet the two terms are often used synonymously.

Include context on institutional inequity early when presenting research: Including institutional (i.e., systems-level) context is particularly important when highlighting negative findings about marginalized groups. Institutional context can include things such as key policies that impact a population, a description of the impact of discrimination on a specific population, current and past access to resources, and more. It is important to include this context throughout a discussion—particularly in the summary and introduction—so that findings are not taken out of context. For additional context, this brief includes an updated discussion about the importance of

preconception health for maternal and child health outcomes and a new indicator (*Lack of health insurance for women of reproductive age*) to illustrate these points.

Racism Creates Inequities in Maternal and Child Health

Differences in maternal and child health outcomes by race/ethnicity in the United States are caused by ongoing experiences with institutional and interpersonal racism. Institutionalized racism leads to inequities by race/ethnicity in social determinants of health like education, high-quality health care, and safe neighborhoods, which in turn impact maternal and child health outcomes. Socioeconomic status (SES), or class, can also impact these social determinants of health; however, disparities in health outcomes by race/ethnicity often persist even after accounting for SES.⁸ Additional societal influences, like interpersonal racism, also influence the racial/ethnic disparities in maternal and child health. For example, Black parents and babies experience higher mortality rates than White parents and babies, regardless of maternal education or income.⁹ Similarly, we find evidence of racial disparities even after accounting for education and income in our analysis of factors that influence the odds of a mother breastfeeding for at least 6 months (additional information on this analysis is in the Breastfeeding section and Appendix A).

This section discusses three ways in which racism drives disparities in maternal and child health: 1) it increases stress and weathering, 2) it limits access to high-quality health care, and 3) it reduces the quality of care received. While much of the existing literature on health disparities and race/ethnicity focuses on Black, Hispanic, and White parents, racism has an impact on the experiences of all people of color.

Stress and weathering

Throughout our nation's history, institutionalized and interpersonal racism have limited or blocked opportunities for people of color. These experiences result in the accumulation of stress among people of color that detrimentally affects health outcomes^{10,11} and results in the health disparities we see today. For example, Black individuals of all socioeconomic statuses can experience weathering, which is defined

Maternal and Child Health, Race/ Ethnicity and SES

Maternal and child health outcomes vary by both race/ethnicity and SES.

Racism underlies disparities by race/ethnicity that exist for women of color at every SES level.

As a result of institutionalized racism, women of color are also over-represented among women living in poverty or with low incomes.^a

While race/ethnicity and SES have distinct influences on maternal and child health, these factors are related and compounded among women of color due to the shared root cause of racism.

^a <https://www.census.gov/library/stories/2020/09/poverty-rates-for-blacks-and-hispanics-reached-historic-lows-in-2019.html>

as the build-up of daily emotional stress related to exposure to racism that leads to differences in health outcomes over the lifespan.^{12,13} Looking at maternal and child health in the United States, Black parents' lifelong exposure to racism has been linked to the incidence of preterm births,¹⁴ low birth weight,¹⁵ and infant mortality.¹⁶ While stress and weathering associated with racism impact parents of color regardless of SES, parents of color also disproportionately experience a number of risks associated with poverty. Black parents and their families are more likely to live in poor-quality and unstable housing, and to be exposed to environmental toxicants, interpersonal and neighborhood violence,¹⁷ and inadequate resources.¹⁸ The direct effect of these circumstances, as well as the stress they create, threaten maternal and child well-being, beginning prenatally.

Access to health care

The history of institutionalized racism in the United States includes discriminatory practices intended to exclude people who are incarcerated, people with a mental disability, and people of color from receiving appropriate health care. These practices have included coercing women into unwanted medical procedures, such as sterilization or abortion.¹⁹ For example, from 1970 to 1976, 25 to 50 percent of Native American women were sterilized unknowingly or against their will by the Indian Health Service (IHS), a federally funded health system responsible for providing care to American Indian and/or Alaska Native (AI/AN) populations, due to government interest in lowering Native American birth rates. These forced sterilizations occurred even after legislation was passed in 1974 to protect women from the practice.²⁰ The history of government-sanctioned unethical practices, together with a broader legacy of mistreatment of people of color by the health care system, underlies a pervasive distrust of the medical establishment within many communities of people of color.²¹ Discrimination in health care is not only a historical fact but a current reality lived by people of color. In a 2017 national poll, nearly one third of Black Americans reported that they had personally experienced racial discrimination during a visit with a health care provider, and 22 percent said they had avoided seeking care because they were wary of discrimination.²²



Black and Hispanic individuals have highlighted concerns related to racism—such as disparities in health outcomes, discomfort associated with receiving care from physicians of dissimilar race/ethnicities, and fear of medical experimentation—as negatively impacting their access to medical care.²³

As a result of institutionalized racism, people of color face systematic challenges in accessing medical care. Barriers related to institutionalized racism can also include distance to medical care (facilities or providers), high cost of care and lack of affordable health insurance, lack of culturally responsive care, and restrictions due to immigration status. Many AI/AN families living in rural areas may not have access to nearby medical care.²⁴ Limited funding prevents

the IHS from meeting the needs of all AI/AN families, and limited access to employee-sponsored health coverage or expanded Medicaid coverage limits AI/AN families' access to health insurance coverage.²⁵ Hispanic families may face barriers to health care access related to a lack of resources available in their home language or restricted eligibility due to immigration status.²⁶ Limited access to health care works in tandem with high stress and low quality of care to negatively impact maternal and child health outcomes; improving access to care without addressing underlying factors associated with racism will not alleviate disparities.²⁷ For example, compared to White women receiving late or no prenatal care, Black parents using prenatal care in the first trimester still experience higher rates of infant mortality.²⁸

Quality of health care

Even when parents-to-be can access health care, parents of color systematically receive lower-quality care and inequitable treatment from providers. As a result of institutionalized racism, people of color often receive care in or only have access to lower-quality hospitals. Hospital quality of care refers to hospital characteristics, such as promotion and use of evidence-based practices or processes for ensuring patient safety, that have been linked to improved health outcomes. A growing body of literature suggests that between-hospital differences on these characteristics contribute to differential health outcomes for patients of color and White patients.²⁹ For example, after controlling for background factors, both Black and White birthing people experienced poorer birth outcomes in hospitals serving higher numbers of Black patients. The implication is that supporting quality improvements in hospitals that serve a high proportion of people of color could not only improve outcomes for all patients, but also begin to address racial/ethnic health disparities.³⁰

Interpersonal racism also drives racial/ethnic differences in the quality of health care received, with health care professionals' differential beliefs about people of color influencing the quality of the treatment they provide.³¹ The preponderance of evidence indicates the existence of racist beliefs, emotions, and practice among U.S. health care providers.³² People of color are more likely to experience interactions with health care providers that are unsupportive and disempowering. A study of the experiences of women of color with low incomes—including Black, Hispanic, AI/AN, Asian, and multi-racial women—found that, during pregnancy, birth, and postpartum care, women of color with low incomes reported provider stereotyping.³³ Providers minimized the mother's ability to be an active participant in making health care decisions, resulting in feelings of disrespect and frustration for the parents. Negative experiences can erode trust in the medical system, which can negatively affect health decision making.³⁴

Addressing disparities in health care quality requires institutional change. Implicit bias training can be a positive first step, but has been shown to have minimal effect due to a focus on individual instead of systemic change.³⁵ Current efforts to address interpersonal racism among health care providers have focused on medical training and research; for example, practitioners at Harvard Medical School are starting to address disparities in how race/ethnicity and racism are integrated into teaching and practice, such as in assessing disease risk, and determining diagnoses and treatments.³⁶ To improve maternal and child health outcomes, policies that increase access to health care must include

improvements to health care quality for people of color and address underlying causes of health disparities related to racism.

Maternal and Child Health Inequities Exist for Many Indicators

The *State of Babies Yearbook: 2021* data confirm clear racial/ethnic inequities on a number of indicators for maternal and child well-being (Appendix A). The indicators in this section highlight key events for mothers during preconception, pregnancy, and birth, and in their babies' first months of life.

In the discussion that follows, data are disaggregated wherever possible by race and ethnicity. The racial/ethnic data available vary by data source and thus by indicator. National data sets unfortunately often limit data disaggregation to Black, Hispanic, and White, grouping all other racial and ethnic populations into an “Other” category. The data also often do not allow further disaggregation within race/ethnicity categories. For example, data on Hispanic people cannot be disaggregated by country of origin. Additionally, data about Asian people are sometimes grouped in the same category with data for Native Hawaiian and Other Pacific Islander (NH/PI) people, but are sometimes presented separately. Most data sets include a “Multiple Races” category, which includes data for individuals reporting two or more races. Finally, the category “Hispanic” includes Hispanic people of all races, whereas other racial categories (e.g., Asian, Black, or White) include only Non-Hispanic people for each respective group (e.g., Non-Hispanic Asian, Non-Hispanic Black, or Non-Hispanic White).

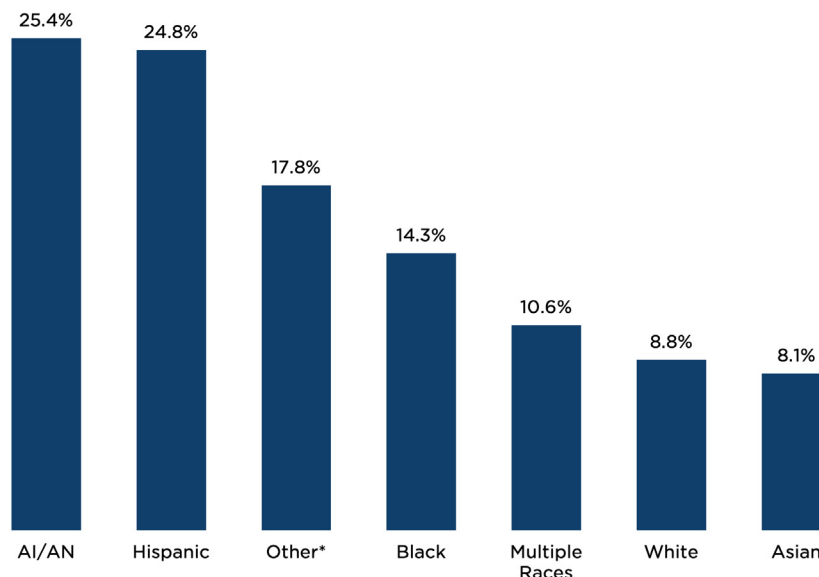
When we make comparisons in the brief between specific groups (e.g., Black women and White women), it is because the given groups had the largest difference in outcomes; there is no intention to center White women as the norm (nor the ideal) in this brief. Improvements in maternal and child health are needed for all racial/ethnic identities in the United States. Specifically, we compare national percentages for the two racial/ethnic categories with the least favorable figures to the percentage of the racial/ethnic category with the most favorable figure. For state-level comparisons, we provide each indicator's range by racial/ethnic category to highlight inequities across states. Data for each state and each racial/ethnic category are not always available.

Lack of health insurance (Table A)

This indicator covers the percentage of women ages 18 to 44 who do not have health insurance. Nationally, about one quarter of Hispanic and AI/AN women of reproductive age have no health insurance (24.8% and 25.4%, respectively); this is more than three times the percentage of Asian women of reproductive age who do not have health insurance (8.1%). Hispanic people often face challenges accessing health insurance due to a variety of factors, including restrictions related to their immigration status and difficulty accessing information about insurance and enrollment due to limited English proficiency.³⁷ AI/AN women often experience low rates of employment or low-wage employment, both of which are barriers to health insurance coverage.³⁸ Medicaid helps fill this gap, but about half of AI/AN people with low incomes live in states that have

not implemented Medicaid expansion.³⁹ **Figure 1** also includes information about women of reproductive age who lack health insurance for the following groups: Asian, Black, Multiple Races, White, and “Other”.

Figure 1. Lack of Health Insurance, by Race/Ethnicity, 2018



Note. Data for the “Other” category include data for individuals who did not self-identify as AI/AN, Hispanic, Black, Multiple Races, White, or Asian.

Prenatal care^d (Table B)

A common indicator of prenatal care access is the percentage of pregnant people who receive late prenatal care, defined as care beginning in the third trimester, or those who receive no prenatal care prior to delivery.⁴⁰ Nationally, 20.2 percent of pregnant NH/PI people receive late or no prenatal care, compared to 13.1 percent of pregnant AI/AN people, 9.9 percent of pregnant Black people, 7.7 percent of pregnant Hispanic people, 4.9 percent of pregnant Asian people, and 4.5 percent of pregnant White people.⁴¹ The percentage of pregnant NH/PI people receiving late or no prenatal care is 4.5 times the percentage for pregnant White people, while the comparable percentage of pregnant AI/AN people is 2.9 times the percentage for pregnant White people. In one study, NH/PI women indicated experiencing language and transportation barriers to care.⁴² In another study, AI/AN women indicated facing barriers due to the cost of care, lack of insurance coverage, and lengthy appointment wait times.⁴³ Lack of access to culturally responsive care is another factor that pregnant NH/PI and AI/AN people often report; this contextualizes the lower percentages of prenatal care received among these populations.^{44,45}

Racial/ethnic disparities are also pronounced from state to state. For pregnant Black

^d This indicator uses a Centers for Disease Control and Prevention (CDC) report for national data, which reports data for the following groups: NH/PI, AI/AN, Black, Hispanic, Asian, and White. State-level data are drawn from the *State of Babies Yearbook: 2021*. Data are for 2018 and include data for the following groups—Black, Hispanic, and White—although additional groups were available. Data for this indicator were not updated from the *State of Babies Yearbook (SoBY) 2020*, as the 2019 data were not released in time for the SoBY 2021 data update. Future updates will follow the SoBY convention to report data for as many groups as available.

people, percentages of late or no prenatal care vary from 3.2 percent (Rhode Island) to 15.1 percent (Texas); for pregnant Hispanic people, the range is 1.9 percent (Rhode Island) to 22.5 percent (Alabama); and for pregnant White people, the range is 1.2 percent (Rhode Island) to 7.7 percent (New Mexico). In 26 states^e and the District of Columbia, the percentage of pregnant Black people who receive late or no prenatal care is more than twice the percentage for pregnant White people.

Preterm births^f (Table C)

Preterm births are births that occur before 37 complete weeks of pregnancy.⁴⁶ National preterm birth percentages are as follows: 14.1 percent for Black birthing people, 11.8 percent NH/PI birthing people, 11.5 percent for AI/AN birthing people, 9.7 percent for Hispanic birthing people, 9.1 percent for White birthing people, and 8.6 percent for Asian birthing people.⁴⁷ The percentage of preterm births for Black birthing people is 1.7 times the percentage for Asian birthing people, with a percentage among AI/AN birthing people that is 1.3 times the percentage for Asian birthing people. Research shows a relationship between psychosocial stress and preterm birth.⁴⁸ Stress due to institutional racism underlies the increased risk factors that Black and AI/AN women experience, which lead to preterm births. Research also finds that Black and AI/AN women are more likely than White women to report stressful life events, including events related to finances and trauma.

Preterm birth percentages for Black birthing people vary by state, from 7.7 percent (South Dakota) to 17.3 percent (Mississippi); for Hispanic birthing people, the range is 5.8 percent (Maine) to 11.1 percent (Iowa and Utah); and for White birthing people, the range is 6.3 percent (District of Columbia) to 12.2 percent (Mississippi). In Arkansas, the District of Columbia, Louisiana, Michigan, and Wisconsin, preterm birth percentages for Black birthing people are more than 6 percentage points higher than the percentages for White birthing people.

Low birthweight^g (Table D)

Low birthweight is when a baby is born weighing less than 5 pounds and 8 ounces (2,500 grams).⁴⁹ Preterm birth often results in low birthweight.⁵⁰ Nationally, the percentages of low birthweight are as follows: 14.1 percent for Black birthing people, 9.0 percent for NH/PI birthing people, 8.6 percent for Asian birthing people, 8.0 percent for AI/AN birthing people, 7.5 percent for Hispanic birthing people, and 6.9 percent for White birthing people.⁵¹ The figure for Black birthing people is 2.0 times the percentage for White birthing people, and the figure for NH/PI birthing people is 1.3 times the percentage for their White counterparts. The weathering that Black women experience

^e Colorado, Connecticut, Georgia, Idaho, Illinois, Indiana, Iowa, Kansas, Maine, Maryland, Massachusetts, Michigan, Minnesota, Missouri, Nebraska, New Jersey, New York, North Dakota, Oregon, Pennsylvania, Rhode Island, South Dakota, Texas, Utah, Washington, and Wisconsin. Data not available for Montana, Vermont, and Wyoming.

^f This indicator uses a CDC report for national data, which reports data for the following groups: NH/PI, AI/AN, Black, Hispanic, Asian, and White. State-level data are drawn from the *State of Babies Yearbook: 2021*. Data are for 2018 and include data for the following groups—Black, Hispanic, and White—although additional groups were available. Data for this indicator were not updated from the SoBY 2020, as the 2019 data were not released in time for the SoBY 2021 data update. Future updates will follow the SoBY convention to report data for as many groups as available.

^g This indicator uses a CDC report for national data, which reports data for the following groups: NH/PI, AI/AN, Black, Hispanic, Asian, and White. State-level data are drawn from the *State of Babies Yearbook: 2021*. Data are for 2018 and include data for the following groups—Black, Hispanic, and White—although additional groups were available. Data for this indicator were not updated from the SoBY 2020, as the 2019 data were not released in time for the SoBY 2021 data update. Future updates will follow the SoBY convention to report data for as many groups as available.

due to racism in the United States helps explain the existence of these disparities.⁵² Additionally, research finds that the rate of low birthweight deliveries for African women who immigrated to the United States are more similar to the rate of White women, further supporting the weathering hypothesis: The racism that Black women born in the United States experience over the course of their lives underlies the inequities in low birthweight.⁵³

For Black birthing people, percentages of low birthweight range from 8.4 percent (South Dakota) to 17.0 percent (Mississippi); for Hispanic birthing people, state-level percentages range from 5.8 percent (Alaska) to 10.4 percent (Montana); and for White birthing people, the percentages range from 4.8 percent (Alaska) to 9.7 percent (Wyoming). In 18 states^h and the District of Columbia, the low birthweight percentage for Black birthing people is more than double that of White birthing people.

Infant mortalityⁱ (Table E)

Infant mortality is defined as a death within the first year of life and is often measured as the number of deaths per thousand live births.⁵⁴ The infant mortality rate for Black babies (11.1 deaths per thousand live births) is 2.7 times that for Asian/Pacific Islander (A/PI) babies (4.1), while the mortality rate for AI/AN babies (8.4) is 2.0 times the rate for A/PI babies.⁵⁵ The mortality rate is 5.0 per thousand for Hispanic babies and 4.8 for White babies. The infant mortality rates for these racial/ethnic groups, as well as the national average, are higher than the infant mortality rates in many other high-income countries.⁵⁶ After birth defects, preterm birth and low birthweight are two of the most common causes of infant mortality.⁵⁷ The racism-related stress that Black and AI/AN women experience results in high rates of preterm birth and contextualizes their babies' mortality outcomes.

For Black babies, the infant mortality rate varies by state from 7.6 (Massachusetts) to 15.0 (Wisconsin); for Hispanic babies, the range is 4.1 (Washington) to 7.4 (Delaware); and for White babies, the range is 2.9 (New Jersey and the District of Columbia) to 7.2 (Arkansas). In every state (and the District of Columbia) except Arkansas, Indiana, Kentucky, Mississippi, Tennessee, and West Virginia,^j the mortality rate for Black babies is at least twice that of White babies.

Maternal mortality and morbidity (Tables F and G)

Maternal mortality encompasses pregnancy-related deaths, defined as deaths during pregnancy or within one year of the end of pregnancy from a pregnancy complication, and is often measured as the number of deaths per 100,000 live births.^{58,59} Nationally, the maternal mortality rate among Black birthing people is 37.3 deaths per 100,000 live births. The rate is 14.9 for White birthing people and 11.8 for Hispanic birthing people.^{k,60} Data for 2018 did not include AI/AN birthing people or Asian or Pacific Islander birthing

^h Alabama, Alaska, Arkansas, California, Connecticut, Georgia, Hawaii, Illinois, Louisiana, Michigan, Missouri, Nebraska, New Jersey, New York, Pennsylvania, South Carolina, Virginia, and Wisconsin. Data not available for Montana, Vermont, and Wyoming.

ⁱ This indicator uses SoBY 2021 data for state and national data and adds information for A/PI. Data are for 2015-2017.

^j Data not available for Alaska, Idaho, Maine, Montana, New Hampshire, New Mexico, North Dakota, South Dakota, Vermont, and Wyoming.

^k Data are for 2018.



people, but rates for the previous period (2015-2016) were 21.9 for AI/AN birthing people and 14.7 for A/PI birthing people.^l The maternal mortality rate for Black birthing people is 3.2 times the maternal mortality rate for Hispanic birthing people, and the rate for AI/AN birthing people is 1.9 times the rate for Hispanic birthing people.^m The disparities in maternal mortality rates in the United States are stark and have persisted for decades.⁶¹ The national maternal mortality rate is well above the maternal mortality rates of other high-income countries.⁶²

These figures are particularly salient and tragic because the majority of maternal deaths can be prevented.⁶³ Factors related to maternal mortality are tied to the quality of care provided (e.g., providers' responses, including delays in treatment and ineffective treatments), as well as the information that providers share (e.g., ensuring patients know the warning signs of issues like hemorrhage and when to seek care). Racial/ethnic disparities are evident in the hospitals accessible to women and the quality of care received.⁶⁴ Substance use and suicide due to a lack of access to treatment for mental health conditions are other causes of maternal mortality.⁶⁵

Data on maternal morbidity, or unexpected outcomes of labor and delivery that result in significant short- or long-term consequences to a birthing person's health,⁶⁶ show disparities by race/ethnicity and are critical to consider. About 700 people die each year from pregnancy-related causes,⁶⁷ but for every 10,000 delivery hospitalizations another 140 people can have a severe morbidity.⁶⁸ Severe maternal morbidity includes eclampsia and the receipt of blood transfusions or a hysterectomy.⁶⁹ The rates of severe maternal morbidity per 10,000 delivery hospitalizations are as follows: 240.7 for Black birthing people, 161.3 for Hispanic birthing people, 138.7 for Asian or Pacific Islander birthing people, and 113.6 for White birthing people.^{n,70} The maternal morbidity rate for Black birthing people is 2.1 times the rate for White birthing people, and the rate for Hispanic birthing people is 1.4 times the rate of White birthing people.

^l Data are for 2015-2016. Maternal mortality data group Asian birthing people and Pacific Islander birthing people together.

^m For the AI/AN and Hispanic comparison, we use 2015-2016 data for both groups.

ⁿ Data are for 2015.

Breastfeeding^o (Table H)

The national proportion of babies who were ever breastfed is 73.3 percent for Black babies, 83.2 percent for Hispanic babies, 85.3 percent for Non-Hispanic babies of other races/ethnicities, and 86.2 percent for White babies. The percentage of Black babies who were breastfed is significantly lower than that of Hispanic and White babies and babies of other races/ethnicities. Nationally, the proportion of babies who were still breastfed at 6 months post-delivery is 46.5 percent for Black babies, 49.9 percent for Hispanic babies, 56.9 percent for non-Hispanic babies of other races/ethnicities, and 60.1 percent for White babies (**Table I**). The percentages of Black and Hispanic babies who were breastfed at 6 months are significantly lower than the percentages of White babies and babies of other races/ethnicities.

Looking at state-level data, differences by race/ethnicity in percentages of breastfeeding *at any point post-delivery* are statistically significant in only a few states; however, statistical significance may be due to the larger sample sizes in certain states and urban areas.

To investigate the factors that drive disparities in breastfeeding rates, we compared the odds that a child will be breastfed for at least 6 months, by race/ethnicity after controlling for income and education. Race/ethnicity and SES are highly correlated due to institutional racism; by holding income and education level constant, we can examine the impact of racism on breastfeeding outcomes.

Income, education, and race/ethnicity were all significantly ($p < 0.05$) associated with babies being breastfed for at least 6 months, with education level being the strongest predictor. While economic and education barriers exist in addition to barriers related to racism, racism also plays a role in the racial/ethnic makeup of groups with lower incomes or education levels. For example, parents of color are over-represented among lower SES groups⁷¹ and Black women are more likely to be employed in workplaces that are not supportive of maternal health or breastfeeding practices, as compared to other women of other races/ethnicities.⁷²

Significant differences in the odds of an infant being breastfed for 6 months or more remained between Black and White parents even after accounting for mother's education level and income, indicating that Black women face additional barriers to equitable breastfeeding outcomes related to race/ethnicity alone. These persistent differences can be attributed to institutional or interpersonal racism. For example, due to lack of access to high-quality medical care, Black parents are more likely to receive inadequate information around breastfeeding.⁷³ Persistent low rates of breastfeeding among Black parents have also been linked to earlier eras of racism, when enslaved Black “wet nurses” breastfed White women's babies, often at the expense of their own children's health. The present-day ramifications of this history can be seen in health care providers' push for Black parents to bottle feed their babies, as well as diminished Black peer and family support for breastfeeding.^{74,75} For additional information on this analysis, please see Appendix A.

^o Data are for toddlers ages 19-35 months. The estimates presented here may not line up with estimates published by the CDC, as the published estimates are based on a birth cohort. The public-use data does not have the information needed to calculate birth cohort estimates.



Recommendations for Policymakers and Practitioners to Promote Equity and Improve Maternal and Child Health

The following recommendations build on promising efforts underway in many states to move the nation toward greater equity in the all-important areas of preconception, prenatal, postpartum, and child health.

1 Increase support and access to culturally sensitive, promising practice models, such as midwifery care, group prenatal care, doula care, and breastfeeding support.

Increasing access to midwifery care, group prenatal care, doula care, and breastfeeding supports—along with similar approaches—show promise for improving maternal care and birth outcomes for people of color and their babies. To be responsive to the needs of AI/AN, Black, and Hispanic pregnant and birthing people, the demographics of health professionals should better reflect the populations they serve; at present, historical exclusion and discrimination have caused an underrepresentation of these groups in health care professions.⁷⁶

- **Increase access to midwives.** Preliminary research finds that states with midwives integrated into maternal care and birth settings have significantly lower rates of preterm birth, low birthweight, infant mortality, and cesareans.⁷⁷ Midwives provide primary care—including assessment, diagnosis, and treatment—during the preconception period, prenatal period, childbirth, and the postpartum period.⁷⁸ Midwifery care is patient-centered and emphasizes trusting relationships between the patient and provider.⁷⁹ The Changing Women Initiative, for example, is a Native American-led health initiative that follows a midwifery wellness framework, emphasizes the importance of Native American birthing peoples' access to culturally grounded care, and draws upon traditional knowledge.⁸⁰ Increasing access to culturally grounded care that incorporates traditional practices can also be important for other racial/ethnic groups, such as Black birthing people.⁸¹

- **Invest in group prenatal care.** As reported by the March of Dimes, group prenatal care has been effective in reducing maternal and child health disparities. Specifically, group prenatal care reduces preterm birth among Black people by 41 percent, and by 33 percent among all birthing people.^{82,83,84} The model also improved parents' breast feeding and psychological outcomes, including their readiness for labor and delivery, empowerment, and increased satisfaction with care.^{85,86} CenteringPregnancy is a promising group prenatal care model, which has been tied to lower rates of preterm birth and low birthweight, particularly for Black women.^{87,88} Preliminary research also suggests that CenteringPregnancy is related to increased prenatal and postpartum care visits for Hispanic women.⁸⁹ Key elements of group prenatal care (e.g., culturally responsive care, peer support) may address some of the issues faced by pregnant and birthing people of color who are not Black or Hispanic, although research for these groups is limited.
- **Invest in community-based doulas.** Doulas are nonmedical professionals trained to provide information as well as physical and emotional support to pregnant and birthing people and new parents.⁹⁰ There is promising evidence that doula care can result in lower rates of cesarean and preterm births, as well as significant cost savings, given the reduction in cesarean births.⁹¹ Doulas help birthing people navigate the maternal health care system and may provide additional support to help birthing people obtain care that meets their needs. Additionally, preliminary research finds that Black and Hispanic birthing people in Minnesota who received culturally sensitive doula care had nearly universal breastfeeding initiation (Black: 92.7%; Hispanic: 97.9%).⁹² Doulas are rarely covered by health insurance but community-based doula programs can increase equitable access to doulas and provide people with support, regardless of their resources.^{93,94} Unfortunately, a survey of community-based doula programs found that 95 percent are funded through grants and patient contributions, a funding mix that jeopardizes their sustainability. Medicaid reimbursement could offer more stability to these programs.⁹⁵ Only three states (Indiana,^p Oregon, and Minnesota) have approved Medicaid reimbursements for doulas.⁹⁶
- **Invest in breastfeeding supports.** Preliminary research finds that integrating lactation consultants into provider care can help parents initiate and sustain breastfeeding.⁹⁷ Additionally, research indicates that Black birthing people and babies benefit from direct support through community breastfeeding support groups.⁹⁸ These groups of peers meet to discuss challenges and facilitators to successful breastfeeding and to provide encouragement and support. There is limited research on the impact of breastfeeding support groups for non-Black birthing people, although peer support may address some challenges related to initiating and sustaining breastfeeding.

2 Expand Medicaid coverage through the first year postpartum.

Medicaid provides health insurance for pregnant people with low incomes and their children and, in covering nearly half of all pregnancies and children in the United States, is an important policy for supporting maternal and child health.⁹⁹ Medicaid can be a potential driver of equity, since Black, Hispanic, AI/AN, and NH/PI people are less likely to get private insurance coverage than their White and Asian counterparts. Indeed, in

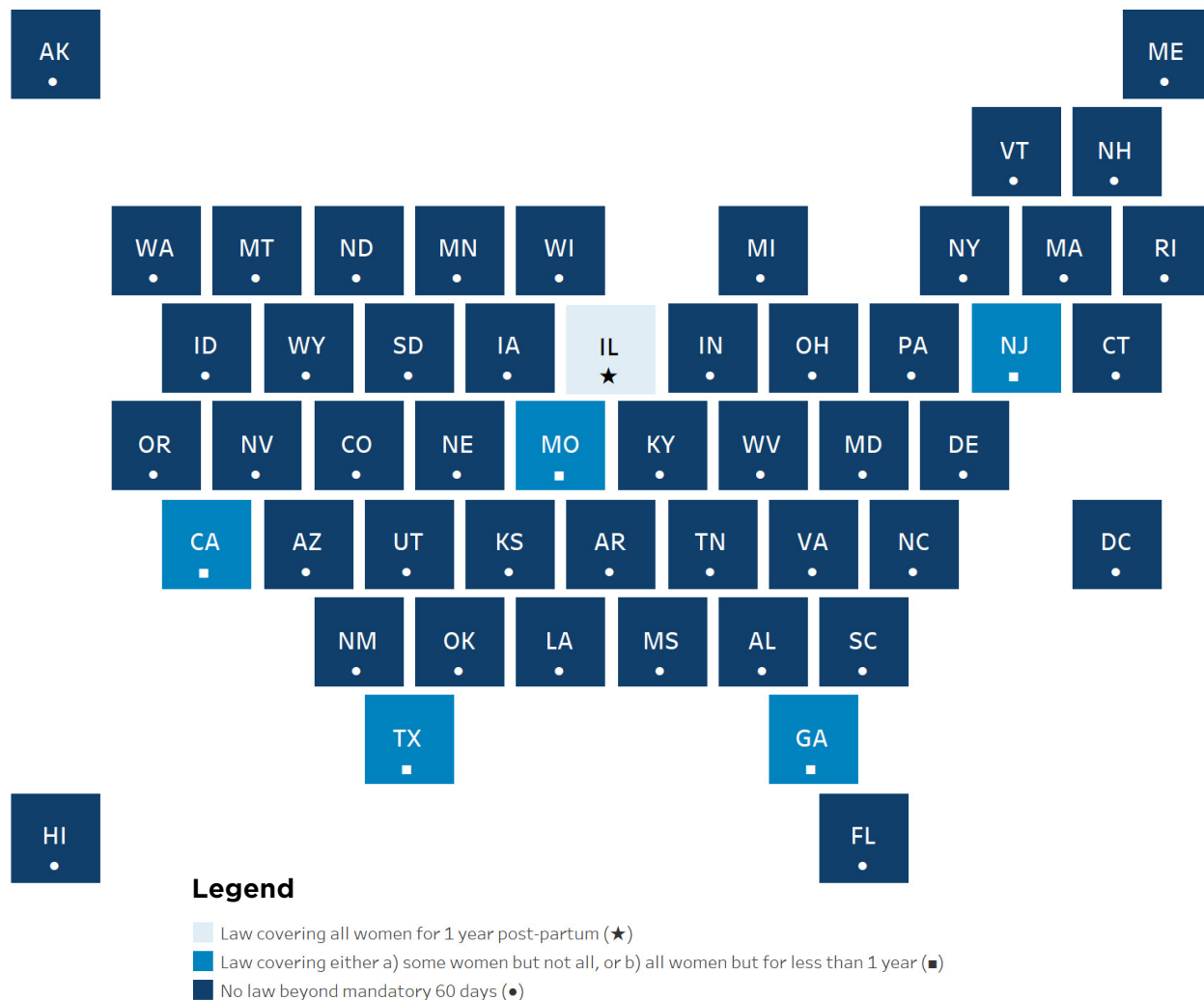
^p The legislation Indiana passed does not include funding, which may cause difficulties with implementation.

2018, Medicaid provided health insurance for 68 percent of birthing Black people, 68 percent of birthing AI/AN people, 65 percent of birthing NH/PI people, and 63 percent of birthing Hispanic people, compared to 33 percent of birthing White people and 27 percent of birthing Asian people.¹⁰⁰ Further, several research studies indicate that Medicaid expansion is associated with improved maternal and infant health for Black and Hispanic families, in particular.¹⁰¹ Mothers covered by Medicaid are more likely to have a regular source of care, visit the doctor, and receive preventive care than women who are uninsured.¹⁰²

- **Continuous postpartum coverage.** One limitation of Medicaid is that people can become eligible when they become pregnant but lose coverage soon after the pregnancy ends. The federal rule requires coverage through 60 days postpartum, even though roughly 30 percent of maternal deaths happen later in the postpartum period.¹⁰³ If the person had a healthy delivery, they are likely to have their first postpartum visit with their health care provider shortly before they lose Medicaid coverage. This means that a parent with a low income could be diagnosed with a condition, such as postpartum depression, and shortly thereafter lose health insurance—and likely also their ability to receive treatment. Medicaid expansion has helped more parents gain postpartum coverage by broadening eligibility. As of November 2020, 39 states and the District of Columbia have expanded Medicaid eligibility (Table J).¹⁰⁴ Medicaid expansion is associated with decreased racial/ethnic disparities in maternal and infant mortality, preterm birth, and low birthweight for Black and Hispanic birthing people and babies.¹⁰⁵ However, even in expansion states, one third of birthing people will still lose Medicaid coverage at 60 days postpartum. Six states have improved postpartum coverage for people with low incomes. For example, in 2019, California allocated funding for 12 months of postpartum coverage for birthing people on Medicaid if they are diagnosed with a maternal mental health condition.¹⁰⁶ Georgia allocated \$19 million to extend postpartum coverage for 6 months. Indiana is requesting a waiver to extend coverage for one year for postpartum people with opioid use disorder.¹⁰⁷ In the past year, 25 states have begun trying to extend Medicaid coverage postpartum for at least some birthing people. Fortunately, the American Rescue Plan Act creates an easier path for states to do this.¹⁰⁸ Although expanded access to Medicaid is a critical step in supporting parents, expansion decreased but did not eliminate disparities in maternal and child health by race/ethnicity.¹⁰⁹ To further promote equity, additional steps are needed.

Figure 2: Nearly All States and the District of Columbia Have Not Extended Postpartum Medicaid Coverage Beyond 60 Days

State Efforts to Extend Medicaid Coverage Beyond 60 Days Postpartum, 2020



Source: The American College of Obstetricians and Gynecologists. (2020). *Policy priorities – extend postpartum Medicaid coverage*. <https://www.acog.org/advocacy/policy-priorities/extend-postpartum-medicaid-coverage>

3 Remove administrative and other barriers to support participation in WIC.

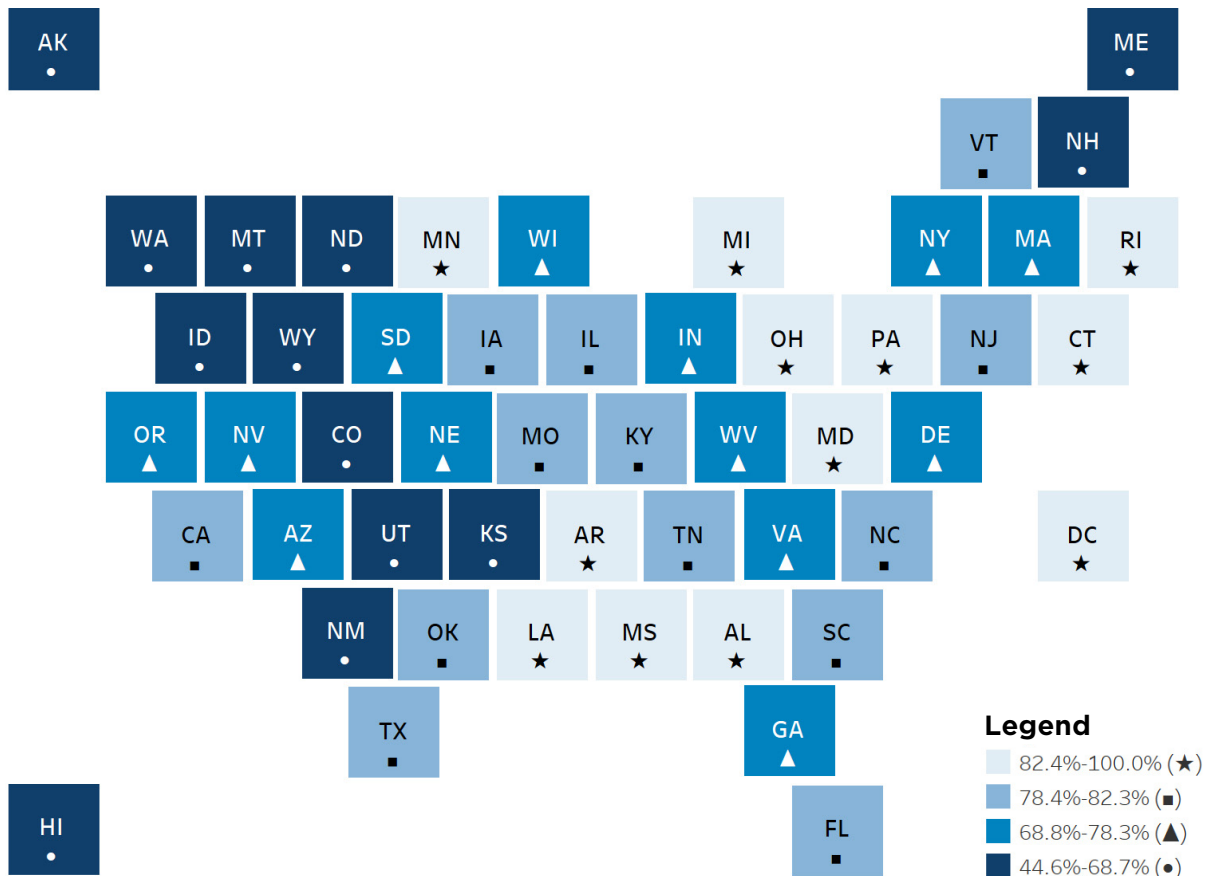
The Special Supplemental Nutrition Program for Women, Infants, and Children (WIC) is a federal program that provides grants to states, Indian Tribal Organizations, and territories to help pregnant and postpartum people with low incomes and their children (through age 5) have access to food, nutrition education, breastfeeding supports, and referrals. WIC serves about 40 percent of all babies in the United States, including roughly 60 percent of Black and Hispanic birthing people and children.¹¹⁰ Numerous evaluations have found that WIC is associated with decreases in pre-term birth and low birthweight, improved maternal health, decreases in infant mortality, improved school

performance, and decreased health care costs.¹¹¹ One evaluation of WIC even found that it decreased the infant mortality rate more for Black babies than it did for White babies.¹¹² The percentage of eligible babies who participated in WIC in 2019 ranged from 44.6 percent (Utah) to 100 percent (District of Columbia; Table M).

Despite WIC's ability to support equity in maternal and child health, enrollment among eligible families has been falling since 2011.¹¹³ In 2017, the percentage of eligible children (birth to age 5) participating in WIC varied by race/ethnicity as follows: 60.2 percent of eligible Hispanic children; 54.5 percent of eligible Black children; 44.2 percent of eligible children who identify as multiple races or not Hispanic, Black, or White; and 38.3 percent of eligible White children.¹¹⁴ From 2011 to 2016, participation dropped by nearly 10 percentage points for Hispanic children and 8 percentage points for Black children.¹¹⁵ Even in 2020, when the COVID-19 pandemic drastically increased food insecurity, participation increased but not above the rates in 2019.¹¹⁶ Suspected causes of decreased participation include the high administrative burden to enroll, as well as the difficult and even stigmatizing process for using the benefit in stores. For example, to enroll in WIC a pregnant or birthing person may need to provide extensive paper documentation and attend four or more appointments every year. Fortunately, many WIC programs are trying to streamline enrollment through better use of technology. For example, Vermont found that 80 percent of phone appointments were kept, as opposed to 50 percent of in-person appointments.¹¹⁷ When a county in Arizona trained WIC staff to accept electronic documents, the percent of clients that lacked all required documents decreased from 26 percent to 2 percent. State and Indian Tribal Organization WIC agencies have the flexibility to make WIC more accessible for eligible families, including via the following means: online appointment scheduling, evening or weekend hours, acceptance of electronic documents, and temporary certification of applicants who do not have all of their documents.¹¹⁸ The American Rescue Plan Act provides \$390 million over four years to support innovation and modernization of the WIC program.¹¹⁹



Figure 3. In Most States, Participation in WIC Falls Short of Total Eligibility
Percentage of Eligible Infants Who Participated in WIC, 2017



Source: United States Department of Agriculture, Food and Nutrition Service. (2020). *WIC 2017 eligibility and coverage rates*. <https://www.fns.usda.gov/wic-2017-eligibility-and-coverage-rates>.

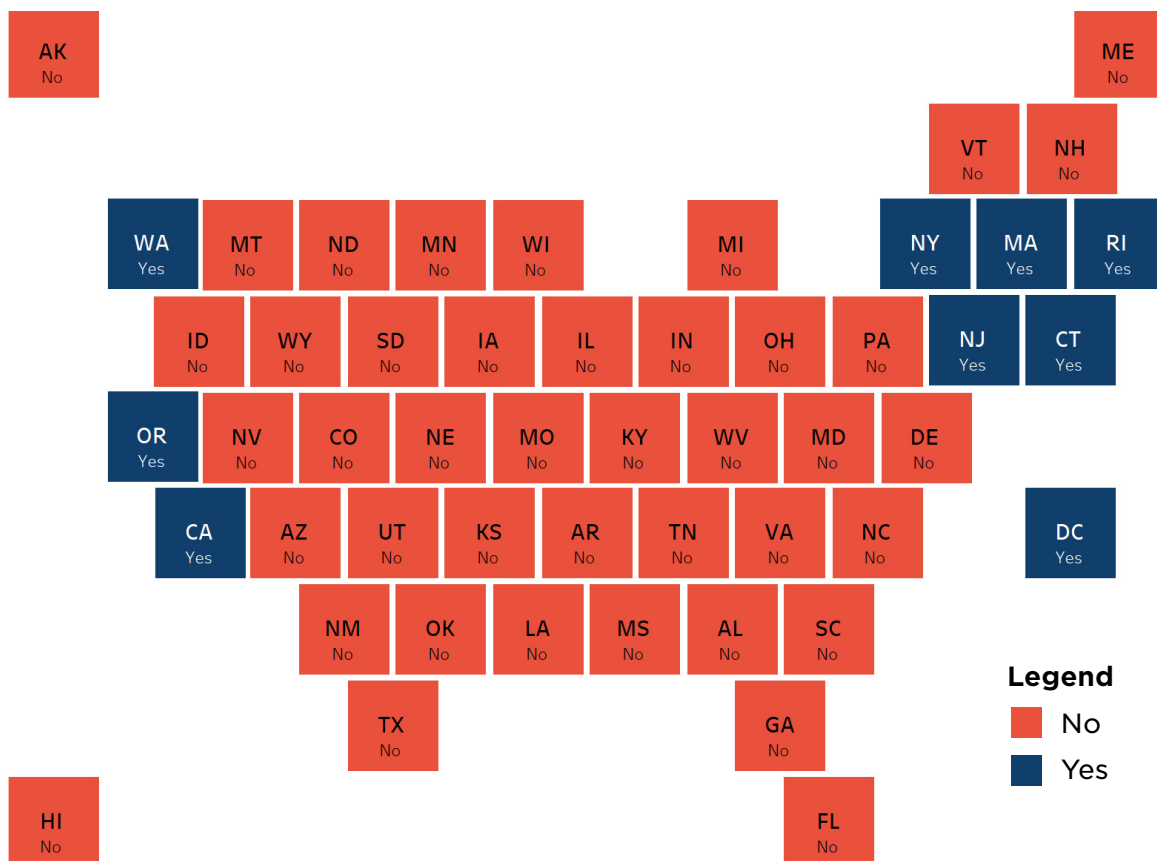
4 Expand access to paid family leave.

The United States lacks a national paid family leave policy, meaning that far too many parents must return to work within days or weeks of giving birth, losing time to recover, breastfeed, and bond. This time is also essential to attend postpartum and well-child medical visits, the latter of which include immunizations important in reducing mortality and illness.^{120,121} Although all parents and caregivers need this time, it is especially important when babies are born preterm, with low birthweight, or with birth defects or developmental difficulties.¹²² Paid family leave is tied to many positive maternal and child outcomes, including increased rates of breastfeeding and immunization, decreased incidence of maternal depression, lower rates of infant mortality, and higher-quality mother-infant interactions.^{123,124,125} Overall, these same benefits do not appear, or are much smaller, for unpaid leave, which fails to promote equity; only families that can afford the lost income can use unpaid leave. When Norway increased its unpaid leave requirement from 12 weeks—twice as long as what is offered in the United States through large employers—to 18 weeks of job-protected paid leave, the country saw improved maternal and child health outcomes for all families and improvements twice as large for families with lower educational attainment.¹²⁶ An evaluation comparing women in the

United States with paid leave versus unpaid or no leave found a 51 percent decrease in the chance of postpartum re-hospitalization of a birthing person or baby. Paid family leave is ideally not gender-specific to allow all parents and caregivers the time to bond and care for the baby; when more than one parent has paid leave, the birthing parent can also be supported in their recovery.

Black and Hispanic parents and caregivers who are employed have less access to paid family and medical leave.¹²⁷ They are more likely to work in low-wage jobs that offer few or no employer-sponsored benefits, such as paid time off, retirement plans, or health insurance.¹²⁸ Despite the lack of a national policy, states are taking action to increase equitable access to leave. For example, in 2019, New Jersey lawmakers expanded paid family leave to 12 weeks and extended requirements to smaller employers.¹²⁹ California raised wage replacement rates⁹ for those taking family leave to 70 percent for lower-wage workers and 60 percent for all other workers.¹³⁰ In addition, studies of California's paid family leave program have found that it eliminated the difference in the number of weeks of leave taken between Black and White mothers, with both reporting seven weeks of leave on average; before the policy, Black mothers took an average of only one week of leave.¹³¹ As of August 2019, eight states and the District of Columbia provide paid family and medical leave for working families (Table N).

Figure 4. Nearly All States Lack Paid Family Leave
State Has a Paid Family Leave Law, as of August 2019



Source: National Partnership for Women and Families. *State paid family and medical leave insurance laws*. (2019). <http://www.nationalpartnership.org/research-library/work-family/paid-leave/state-paid-family-leave-laws.pdf>
 Note: States that have enacted a policy but whose policy has not yet taken effect are included as having a policy.

⁹ The percentage of a worker's normal wages provided for by a paid leave program.

Conclusion

All babies deserve equitable opportunities for a healthy start in life and providing those opportunities requires attention to parental health—particularly the health of people of color in the United States. Effective strategies and practices being instituted at the state and local levels—potentially through the new opportunities afforded by the American Rescue Act—should be brought to scale to address the inequities that disproportionately jeopardize the health of people of color and their families. The impacts of racism in the United States lead to health inequities throughout the lifespan, impacting child health even before conception.

Still, we have only a partial picture of the disparities that may exist. The data available demonstrate a need to gather and report on additional indicators of maternal and child health care access, quality, and outcomes, along with essential activities to improve outcomes and equitably address disparities. Ideally, these data would be available for all races/ethnicities. Due to the cascading effects of early disparities, efforts to achieve greater equity must also begin long before a young child's first pediatric visit. As a society, we can learn from and strengthen successful maternal and child health practices and policies and help to ensure that the well-being of every baby of color is a national priority.



Appendix A

Detailed methods for examining statistical differences by race/ethnicity in the odds of a child being breastfed for at least 6 months

Using the 2018 National Immunization Survey (NIS) data, we examined the relationship between race and ethnicity and the likelihood of a child being breastfed for at least 6 months after accounting for the mother's level of education and income. The NIS data show respondent race and ethnicity are divided into four groups: Hispanic, non-Hispanic White, non-Hispanic Black, and non-Hispanic other. Mother's level of education is represented with four categories: less than high school diploma, high school degree, some college, and college degree. Family income is classified into three categories determined by the ratio of income to the federal poverty threshold: in poverty, low income, and not in poverty or low income. We set the comparison group to be the group with the highest likelihood of being breastfed for at least 6 months: children whose parents are non-Hispanic White college graduates who are not in poverty or have low income. We used a logistic regression approach to examine the role of race/ethnicity in predicting the odds of infants being breastfed for at least 6 months after controlling for education and income.

In the model, education level is a stronger predictor than either income or race/ethnicity for the odds of being breastfed for at least 6 months. The odds of babies whose parents have less than a college diploma being breastfed for at least 6 months is about one third to half of those for a mother with a college diploma. By comparison, the odds of being breastfed for babies living in poverty or in a low-income family were about three quarters the odds for babies not in poverty or low income. After accounting for income and education, the odds of Hispanic babies being breastfed for 6 months are not significantly different than the odds for White babies, meaning that income and education completely accounted for differences between Hispanic and White babies. However, even after accounting for mother's education and income, the odds of Black babies being breastfed for at least 6 months were about three quarters of those for White babies.

The model implies that disparities by race/ethnicity may be driven both by institutional and interpersonal racism. If controlling for income and education eliminated all racial/ethnic disparities, this would suggest that the dominant cause of the disparity is institutional racism leading to people of color being over-represented among lower socioeconomic status (SES) groups.¹³² Controlling for income and education did eliminate the disparity between Hispanic and White babies, but not between Black and White babies. This suggests that if two families had the same incomes and the mothers had the same education levels, the Black baby would still be less likely to be breastfed than the White baby. In turn, this suggests that Black parents face additional barriers to equitable health outcomes, such as experiences with interpersonal racism. These findings are consistent with the literature base demonstrating that health disparities for Black families continue even after accounting for SES.¹³³

This analysis was limited in its ability to further disaggregate results by race and ethnicity and to fully account for the impact of SES. Within the publicly available version of the NIS, only four racial and ethnic groups are included, meaning we were unable to

disaggregate the “other” category to include groups such as American Indian and/or Alaskan Native, Asian, Native Hawaiian or Pacific Islander, or multiple races. Similarly, the publicly available version of the NIS contained an income variable, which did not allow us to assess family wealth. Wealth accounts for additional factors like home ownership or savings that are accumulated over time and may be passed on to future generations. Historically, institutional racism has impacted the ability of people of color to accumulate wealth,¹³⁴ meaning that a family’s income only relays part of the story of how racism perpetuates inequity.



Appendix B

Table A. Lack of health insurance for women of reproductive age, by race/ethnicity, 2018

Country	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black Only	Non-Hispanic Multiple Races	Non-Hispanic Other	Non-Hispanic White Only
United States	24.8%	25.4%	8.1%	14.3%	10.6%	17.8%	8.8%

Source: Centers for Disease Control and Prevention, National Center for Immunization and Respiratory Diseases. (2020). *The 2018 National Immunization Survey - Child [Data set]*. <http://www.cdc.gov/vaccines/imz-managers/nis/datasets.html>

Table B. Percentage of women receiving late/no prenatal care by race/ethnicity, 2018

State	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black	Non-Hispanic Native Hawaiian or Other Pacific Islander	Non-Hispanic White
Alabama	22.5%	NA	NA	8.7%	NA	5.5%
Alaska	7.3%	NA	NA	6.3%	NA	4.8%
Arizona	11.9%	NA	NA	11.0%	NA	5.9%
Arkansas	14.0%	NA	NA	10.1%	NA	7.1%
California	4.1%	NA	NA	5.1%	NA	2.6%
Colorado	8.2%	NA	NA	9.3%	NA	4.4%
Connecticut	4.3%	NA	NA	6.1%	NA	2.6%
Delaware	9.4%	NA	NA	9.4%	NA	5.3%
District of Columbia	5.6%	NA	NA	13.1%	NA	1.6%
Florida	7.4%	NA	NA	10.5%	NA	7.0%
Georgia	12.0%	NA	NA	11.6%	NA	5.4%
Hawaii	8.3%	NA	NA	5.3%	NA	6.4%
Idaho	5.8%	NA	NA	10.0%	NA	3.8%
Illinois	7.2%	NA	NA	12.1%	NA	3.7%
Indiana	9.6%	NA	NA	11.7%	NA	5.0%
Iowa	6.2%	NA	NA	8.2%	NA	3.4%
Kansas	6.7%	NA	NA	7.5%	NA	2.9%
Kentucky	11.0%	NA	NA	8.3%	NA	5.0%
Louisiana	10.5%	NA	NA	8.6%	NA	4.4%
Maine	6.3%	NA	NA	14.6%	NA	3.6%
Maryland	9.1%	NA	NA	9.2%	NA	3.9%
Massachusetts	5.8%	NA	NA	10.8%	NA	3.3%
Michigan	7.6%	NA	NA	8.0%	NA	3.8%
Minnesota	6.5%	NA	NA	6.7%	NA	2.1%
Mississippi	8.3%	NA	NA	6.0%	NA	3.5%
Missouri	11.6%	NA	NA	12.5%	NA	4.7%
Montana	7.4%	NA	NA	NA	NA	4.2%
Nebraska	8.4%	NA	NA	9.2%	NA	3.1%
Nevada	9.7%	NA	NA	10.8%	NA	6.6%
New Hampshire	5.2%	NA	NA	6.6%	NA	3.5%
New Jersey	7.4%	NA	NA	11.5%	NA	4.0%
New Mexico	11.9%	NA	NA	11.2%	NA	7.7%

State	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black	Non-Hispanic Native Hawaiian or Other Pacific Islander	Non-Hispanic White
New York	5.8%	NA	NA	9.9%	NA	3.1%
North Carolina	8.7%	NA	NA	8.9%	NA	5.0%
North Dakota	8.6%	NA	NA	8.8%	NA	3.5%
Ohio	8.7%	NA	NA	9.4%	NA	5.1%
Oklahoma	6.9%	NA	NA	9.4%	NA	5.9%
Oregon	5.5%	NA	NA	9.9%	NA	3.9%
Pennsylvania	8.4%	NA	NA	10.6%	NA	4.9%
Rhode Island	1.9%	NA	NA	3.2%	NA	1.2%
South Carolina	11.4%	NA	NA	8.6%	NA	5.4%
South Dakota	9.1%	NA	NA	8.7%	NA	2.8%
Tennessee	8.5%	NA	NA	7.7%	NA	5.3%
Texas	10.5%	NA	NA	15.1%	NA	6.3%
Utah	6.8%	NA	NA	9.9%	NA	3.2%
Vermont	NA	NA	NA	NA	NA	1.8%
Virginia	7.6%	NA	NA	7.2%	NA	3.7%
Washington	6.7%	NA	NA	9.7%	NA	4.7%
West Virginia	8.3%	NA	NA	9.8%	NA	6.4%
Wisconsin	6.0%	NA	NA	8.1%	NA	3.0%
Wyoming	11.1%	NA	NA	NA	NA	5.5%
United States	7.7%	13.1%	4.9%	9.9%	20.2%	4.5%

Note: This table includes data from two sources. For states listed as “NA”, data were either unavailable due to suppression (based on the data sample) or not reported in the SoBY 2021.

Sources:

State Data: Centers for Disease Control and Prevention, National Center for Health Statistics. (2019). *Nativity public-use data 2018*. CDC WONDER. <http://wonder.cdc.gov/nativity-expanded-current.html>

National Data: Martin, J. A., Hamilton, B. E., Osterman, M.J.K., & Driscoll, A.K. (2019). *Births: Final data for 2018*. National Vital Statistics Reports, 68(13). https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf

Table C. Percentage of births born preterm, by race/ethnicity, 2018

State	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black	Non-Hispanic Native Hawaiian or Other Pacific Islander	Non-Hispanic White
Alabama	9.4%	NA	NA	16.5%	NA	10.9%
Alaska	9.5%	NA	NA	10.8%	NA	7.6%
Arizona	9.6%	NA	NA	12.6%	NA	8.9%
Arkansas	10.2%	NA	NA	16.6%	NA	10.4%
California	9.1%	NA	NA	12.3%	NA	7.7%
Colorado	9.7%	NA	NA	10.7%	NA	8.7%
Connecticut	10.2%	NA	NA	13.2%	NA	8.1%
Delaware	8.3%	NA	NA	12.9%	NA	8.7%
District of Columbia	9.4%	NA	NA	13.5%	NA	6.3%
Florida	9.1%	NA	NA	14.0%	NA	9.2%
Georgia	9.8%	NA	NA	14.6%	NA	10.0%
Hawaii	8.9%	NA	NA	13.2%	NA	7.6%
Idaho	9.6%	NA	NA	9.4%	NA	8.8%
Illinois	10.4%	NA	NA	14.9%	NA	9.5%
Indiana	10.0%	NA	NA	14.3%	NA	9.5%
Iowa	11.1%	NA	NA	11.2%	NA	9.6%
Kansas	9.3%	NA	NA	13.6%	NA	9.2%
Kentucky	9.4%	NA	NA	14.2%	NA	11.2%
Louisiana	10.8%	NA	NA	17.0%	NA	10.6%
Maine	5.8%	NA	NA	9.4%	NA	8.5%
Maryland	9.1%	NA	NA	12.9%	NA	8.7%
Massachusetts	9.8%	NA	NA	11.2%	NA	8.3%
Michigan	9.9%	NA	NA	14.9%	NA	8.8%
Minnesota	9.8%	NA	NA	9.5%	NA	8.6%
Mississippi	10.9%	NA	NA	17.3%	NA	12.2%
Missouri	10.4%	NA	NA	15.2%	NA	9.8%
Montana	10.8%	NA	NA	NA	NA	8.3%

State	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black	Non-Hispanic Native Hawaiian or Other Pacific Islander	Non-Hispanic White
Nebraska	9.8%	NA	NA	13.5%	NA	10.2%
Nevada	9.4%	NA	NA	13.0%	NA	9.3%
New Hampshire	9.1%	NA	NA	9.1%	NA	8.1%
New Jersey	9.8%	NA	NA	13.4%	NA	8.2%
New Mexico	10.1%	NA	NA	13.4%	NA	9.1%
New York	9.6%	NA	NA	12.7%	NA	7.6%
North Carolina	9.1%	NA	NA	13.8%	NA	9.4%
North Dakota	10.1%	NA	NA	9.9%	NA	9.0%
Ohio	9.6%	NA	NA	14.0%	NA	9.5%
Oklahoma	10.7%	NA	NA	15.8%	NA	11.1%
Oregon	9.2%	NA	NA	10.6%	NA	7.2%
Pennsylvania	10.0%	NA	NA	13.7%	NA	8.6%
Rhode Island	9.8%	NA	NA	11.3%	NA	8.2%
South Carolina	9.4%	NA	NA	15.2%	NA	9.7%
South Dakota	10.3%	NA	NA	7.7%	NA	8.5%
Tennessee	9.4%	NA	NA	14.7%	NA	10.3%
Texas	10.8%	NA	NA	14.6%	NA	9.6%
Utah	11.1%	NA	NA	11.0%	NA	8.8%
Vermont	8.3%	NA	NA	8.5%	NA	8.7%
Virginia	8.8%	NA	NA	13.2%	NA	8.4%
Washington	8.7%	NA	NA	10.2%	NA	7.7%
West Virginia	9.8%	NA	NA	14.2%	NA	11.8%
Wisconsin	10.0%	NA	NA	15.6%	NA	9.0%
Wyoming	8.6%	NA	NA	NA	NA	10.0%
United States	9.7%	11.5%	8.6%	14.1%	11.8%	9.1%

Note: This table includes data from two sources. For states listed as “NA”, data were either unavailable due to suppression (based on the data sample) or not reported in the SoBY 2021.

Sources:

State data: Centers for Disease Control and Prevention, National Center for Health Statistics. (2019). *Nativity public-use data 2018*. CDC WONDER. <http://wonder.cdc.gov/nativity-expanded-current.html>

National data: Martin, J. A., Hamilton, B. E., Osterman, M.J.K., & Driscoll, A.K. (2019). *Births: Final data for 2018*. National Vital Statistics Reports, 68(13). https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf

Table D. Percentage of babies born with low birthweight by race/ethnicity, 2018

State	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black	Non-Hispanic Native Hawaiian or Other Pacific Islander	Non-Hispanic White
Alabama	7.6%	NA	NA	16.4%	NA	8.1%
Alaska	5.8%	NA	NA	12.5%	NA	4.8%
Arizona	7.3%	NA	NA	12.4%	NA	7.0%
Arkansas	7.4%	NA	NA	16.0%	NA	7.7%
California	6.7%	NA	NA	12.1%	NA	5.8%
Colorado	9.6%	NA	NA	13.4%	NA	8.6%
Connecticut	8.1%	NA	NA	12.6%	NA	6.0%
Delaware	7.0%	NA	NA	13.7%	NA	7.3%
District of Columbia	6.8%	NA	NA	14.6%	NA	5.2%
Florida	7.1%	NA	NA	13.9%	NA	7.1%
Georgia	7.3%	NA	NA	14.8%	NA	7.3%
Hawaii	6.5%	NA	NA	11.8%	NA	5.6%
Idaho	7.6%	NA	NA	11.2%	NA	7.0%
Illinois	7.5%	NA	NA	14.5%	NA	6.9%
Indiana	7.1%	NA	NA	13.8%	NA	7.1%
Iowa	7.6%	NA	NA	11.3%	NA	6.3%
Kansas	7.3%	NA	NA	13.4%	NA	6.7%
Kentucky	7.2%	NA	NA	14.5%	NA	8.3%
Louisiana	8.8%	NA	NA	16.0%	NA	7.5%
Maine	8.1%	NA	NA	9.3%	NA	7.1%
Maryland	6.9%	NA	NA	12.6%	NA	6.7%
Massachusetts	8.6%	NA	NA	11.0%	NA	6.5%
Michigan	7.3%	NA	NA	14.9%	NA	6.8%
Minnesota	7.6%	NA	NA	10.2%	NA	5.9%
Mississippi	7.1%	NA	NA	17.0%	NA	8.6%
Missouri	7.3%	NA	NA	15.9%	NA	7.3%
Montana	10.4%	NA	NA	NA	NA	6.9%

State	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian	Non-Hispanic Black	Non-Hispanic Native Hawaiian or Other Pacific Islander	Non-Hispanic White
Nebraska	7.7%	NA	NA	13.9%	NA	6.8%
Nevada	7.7%	NA	NA	12.7%	NA	7.7%
New Hampshire	7.9%	NA	NA	12.4%	NA	6.3%
New Jersey	7.5%	NA	NA	12.9%	NA	6.2%
New Mexico	9.4%	NA	NA	13.7%	NA	8.2%
New York	8.2%	NA	NA	12.9%	NA	6.3%
North Carolina	7.5%	NA	NA	14.4%	NA	7.4%
North Dakota	7.7%	NA	NA	9.0%	NA	6.0%
Ohio	7.5%	NA	NA	14.0%	NA	7.2%
Oklahoma	7.0%	NA	NA	15.3%	NA	7.8%
Oregon	7.3%	NA	NA	11.5%	NA	6.2%
Pennsylvania	9.0%	NA	NA	13.9%	NA	6.9%
Rhode Island	7.9%	NA	NA	11.7%	NA	6.6%
South Carolina	7.3%	NA	NA	15.2%	NA	7.0%
South Dakota	7.4%	NA	NA	8.4%	NA	6.1%
Tennessee	7.2%	NA	NA	15.1%	NA	7.8%
Texas	7.9%	NA	NA	13.9%	NA	7.0%
Utah	8.6%	NA	NA	10.6%	NA	6.6%
Vermont	9.9%	NA	NA	NA	NA	6.9%
Virginia	6.9%	NA	NA	13.3%	NA	6.6%
Washington	6.7%	NA	NA	9.8%	NA	5.7%
West Virginia	7.9%	NA	NA	13.6%	NA	9.2%
Wisconsin	7.5%	NA	NA	16.1%	NA	6.4%
Wyoming	7.9%	NA	NA	NA	NA	9.7%
United States	7.5%	8.0%	8.6%	14.1%	9.0%	6.9%

Note: This table includes data from two sources. For states listed as “NA”, data were either unavailable due to suppression (based on the data sample) or not reported in the SoBY 2021.

Sources:

State data: Centers for Disease Control and Prevention, National Center for Health Statistics. (2019). *Nativity public-use data 2018*. CDC WONDER. <http://wonder.cdc.gov/nativity-expanded-current.html>

National data: Martin, J. A., Hamilton, B. E., Osterman, M.J.K., & Driscoll, A.K. (2019). *Births: Final data for 2018*. National Vital Statistics Reports, 68(13). https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf

Table E. Infant mortality rate (deaths per 1,000 live births) by race/ethnicity, 2015-2017

State	Hispanic	Non-Hispanic AI/AN	Non- Hispanic A/PI	Non- Hispanic Black	Non- Hispanic White
Alabama	5.9	NA	NA	13.3	6.0
Alaska	NA	10.2	NA	NA	4.2
Arizona	5.3	8.2	NA	10.6	4.7
Arkansas	4.8	NA	NA	12.2	7.2
California	4.4	6.4	NA	8.5	3.4
Colorado	5.0	NA	NA	8.6	4.0
Connecticut	5.5	NA	NA	11.5	3.1
Delaware	7.4	NA	NA	12.8	5.7
District of Columbia	6.0	NA	NA	12.4	2.9
Florida	4.5	NA	NA	10.8	4.8
Georgia	5.9	NA	NA	11.6	5.1
Hawaii	5.2	NA	NA	13.5	4.2
Idaho	6.3	NA	NA	NA	4.7
Illinois	5.4	NA	NA	12.5	4.6
Indiana	7.2	NA	NA	12.8	6.5
Iowa	6.1	NA	NA	10.5	4.6
Kansas	5.6	NA	NA	11.3	5.5
Kentucky	5.9	NA	NA	10.4	6.4
Louisiana	5.7	NA	NA	11.4	5.1
Maine	NA	NA	NA	NA	6.0
Maryland	5.0	NA	NA	10.8	4.2
Massachusetts	5.4	NA	NA	7.6	3.0
Michigan	6.7	NA	NA	12.8	5.0
Minnesota	5.0	12.1	NA	8.7	4.0
Mississippi	5.5	NA	NA	11.8	6.9
Missouri	5.6	NA	NA	12.1	5.4
Montana	NA	12.4	NA	NA	4.6
Nebraska	5.6	NA	NA	11.6	5.2
Nevada	4.9	NA	NA	9.9	4.7
New Hampshire	NA	NA	NA	NA	3.5
New Jersey	4.5	NA	NA	9.7	2.9
New Mexico	5.3	6.6	NA	NA	5.4
New York	4.4	NA	NA	8.9	3.6

State	Hispanic	Non-Hispanic AI/AN	Non- Hispanic A/PI	Non- Hispanic Black	Non- Hispanic White
North Carolina	5.4	9.0	NA	12.4	5.5
North Dakota	NA	11.4	NA	NA	4.9
Ohio	6.9	NA	NA	14.2	5.7
Oklahoma	6.4	9.3	NA	13.4	6.4
Oregon	5.0	NA	NA	9.8	4.9
Pennsylvania	6.2	NA	NA	11.1	4.8
Rhode Island	6.0	NA	NA	14.1	4.3
South Carolina	5.6	NA	NA	10.4	5.1
South Dakota	NA	10.8	NA	NA	5.7
Tennessee	5.8	NA	NA	11.4	6.1
Texas	5.4	5.7	NA	10.2	4.9
Utah	5.6	NA	NA	11.2	5.1
Vermont	NA	NA	NA	NA	3.9
Virginia	4.4	NA	NA	10.0	4.8
Washington	4.1	7.5	NA	8.1	4.0
West Virginia	NA	NA	NA	13.5	6.9
Wisconsin	5.8	12.3	NA	15.0	4.7
Wyoming	NA	NA	NA	NA	4.7
United States	5.0	8.4	4.1	11.1	4.8

Notes: For states listed as “NA”, data were either unavailable due to suppression (based on the data sample) or not reported in the SoBY 2021.

Source: Centers for Disease Control and Prevention, National Center for Health Statistics. (2019). *Infant mortality in the United States, 2017: Data from the period linked birth/infant death file*. National Vital Statistics Reports, 68(10). https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_10_tables-508.pdf

Table F1. Number of pregnancy-related deaths per 100,000 live births by race/ethnicity, 2018

Country	Hispanic	Non-Hispanic Black	Non-Hispanic White
United States	11.8	37.3	14.9

Source: Centers for Disease Control and Prevention. (2020). *Maternal mortality by state, 2018*. <https://www.cdc.gov/nchs/maternal-mortality/MMR-2018-State-Data-508.pdf>

Table F2. Number of pregnancy-related deaths per 100,000 live births by race/ethnicity, 2015-2016

Country	Hispanic	Non-Hispanic American Indian or Alaska Native	Non-Hispanic Asian or Pacific Islander	Non-Hispanic Black	Non-Hispanic White
United States	11.6	21.9	14.7	40.8	13.2

Source: Petersen, E.E., Davis, N.L., Goodman, D., Cox, S., Syverson, C., Seed, K., Shapiro-Mendoza, C., Callaghan, W.M., & Barfield, W. *Racial/ethnic disparities in pregnancy-related deaths – United States, 2007–2016*. *Morbidity and Mortality Weekly Report (MMWR)*. https://www.cdc.gov/mmwr/volumes/68/wr/mm6835a3.htm?s_cid=mm6835a3_w#suggestedcitation

Table G. Number of deliveries involving severe maternal morbidity per 10,000 delivery hospitalizations by race/ethnicity, 2015

State	Hispanic	Non-Hispanic Asian/Pacific Islander	Non-Hispanic Black	Non- Hispanic White
United States	161.3	138.7	240.7	113.6

Source: Ingar, K.R., Hambrick, M.M., Heslin, K.C., & Moore, J.E. (2018). *Trends and disparities in delivery hospitalizations involving severe maternal morbidity, 2006-2015: Statistical brief #243*. Agency for Healthcare Research and Quality. <https://hcup-us.ahrq.gov/reports/statbriefs/sb243-Severe-Maternal-Morbidity-Delivery-Trends-Disparities.jsp>

Table H. Percentage of infants ever breastfed, by race/ethnicity, 2018

State	Hispanic	Non-Hispanic Black	Non-Hispanic Other Race	Non-Hispanic White
Alabama	68.8% *	68.1% *	72.1% *	79.6%
Alaska	91.0%	NA	87.6%	95.8%
Arizona	83.7%	NA	87.5%	87.9%
Arkansas	75.6% *	67.2% *	74.5% *	71.6%
California	80.8%	69.5% *	96.1%	92.2%
Colorado	89.4%	NA	87.3% *	91.0%
Connecticut	86.3%	NA	89.3% *	93.1%
Delaware	78.5%	77.0% *	76.8% *	83.9%
District of Columbia	82.1% ^b	67.2% ^{b,c}	89.9% *	96.7%
Florida	79.6%	64.4% *	84.5% *	83.3%
Georgia	77.8%	84.4%	87.2%	81.1%
Hawaii	97.5% ^c	NA	85.1%	93.9%
Idaho	82.8% *	NA	NA	93.7%
Illinois	84.5% ^a	60.9% ^{b*}	79.6%	86.7%
Indiana	83.8% *	73.1% *	83.9% *	81.0%
Iowa	71.1% *	NA	NA	90.2%
Kansas	80.2% *	NA	85.5% *	90.9%
Kentucky	92.7% ^b	NA	69.7% *	72.1%
Louisiana	84.3% ^a	54.2% ^{b*}	68.5% *	76.1%
Maine	NA	NA	83.3% *	87.1%
Maryland	82.9% *	84.0%	73.9% *	87.2%
Massachusetts	85.9%	91.4% *	91.0% *	84.5%
Michigan	80.3% *	66.6% *	85.7% *	85.5%
Minnesota	90.9% *	91.3% *	90.8%	91.5%
Mississippi	63.5% *	55.8% ^b	68.7% *	71.8%
Missouri	86.7% ^{a*}	56.0% ^{b*}	82.2% *	85.1%
Montana	93.2%	NA	76.6% *	92.2%
Nebraska	70.2% ^{b*}	NA	NA	90.3%
Nevada	81.3%	68.2% *	85.3%	83.8%
New Hampshire	88.9% *	NA	94.2% *	87.9%
New Jersey	86.3%	85.2% *	92.7%	87.3%

State	Hispanic	Non-Hispanic Black	Non-Hispanic Other Race	Non-Hispanic White
New Mexico	82.7% ^{b,c}	NA	97.7%	92.3%
New York	89.4%	81.1% *	80.5%	87.7%
North Carolina	84.1%	70.8% *	84.3% *	88.2%
North Dakota	92.2% *	NA	75.3% *	89.6%
Ohio	79.2% *	71.5% *	78.1% *	80.8%
Oklahoma	87.3%	NA	72.0%	81.7%
Oregon	91.8%	NA	85.2% *	95.2%
Pennsylvania	76.0%	80.7%	87.6%	85.4%
Rhode Island	77.5%	NA	84.2% *	78.3%
South Carolina	86.9% ^a	64.1% *	83.3% *	80.9%
South Dakota	85.0% *	NA	77.4% *	90.3%
Tennessee	71.1% *	78.9% *	83.8% *	83.5%
Texas	84.9%	79.7%	82.2%	87.7%
Utah	82.6% *	NA	91.3% *	92.4%
Vermont	NA	NA	89.7% *	87.6%
Virginia	93.8%	87.7% *	88.1% *	85.4%
Washington	88.8% *	NA	92.0% *	91.7%
West Virginia	NA	NA	78.0% *	72.2%
Wisconsin	74.9% ^{b*}	NA	73.4% *	94.2% ^c
Wyoming	86.8%	NA	NA	92.4%
United States	83.2% ^a	73.3% ^{b,c}	85.3%	86.2%

Notes:

States listed as “NA” indicate that data were suppressed because there were fewer than 30 respondents.

^aIndicates statistically significant difference with Non-Hispanic Black (p < 0.05, after a Bonferroni correction for making multiple comparisons between race/ethnic groups)

^bIndicates statistically significant difference with Non-Hispanic White (p < 0.05, after a Bonferroni correction for making multiple comparisons between race/ethnic groups)

^cIndicates statistically significant difference with Non-Hispanic Other Race (p < 0.05, after a Bonferroni correction for making multiple comparisons between race/ethnic groups)

*Indicates unreliable data due to sample size limitations. These data have confidence intervals of more than 20 percentage points or there was no variation in the cell (i.e., 0% or 100% of respondents indicated this response).

Source: Centers for Disease Control and Prevention, National Center for Immunization and Respiratory Diseases. (2020). *The 2018 National Immunization Survey - Child [Dataset]*. <http://www.cdc.gov/vaccines/imz-managers/nis/datasets.html>

Table I. Percentage of infants breastfed at 6 months, by race/ethnicity, 2018

State	Hispanic	Non-Hispanic Black	Non-Hispanic Other Race	Non-Hispanic White
Alabama	41.6% *	36.5% *	34.6% *	42.5%
Alaska	64.3% *	NA	56.2%	77.9% ^c
Arizona	48.6%	NA	51.6% *	62.7%
Arkansas	41.7% *	33.7% *	35.6% *	39.4%
California	47.5% ^{b*}	NA	62.6% *	69.8% *
Colorado	65.5% *	NA	50.7% *	70.7%
Connecticut	48.6% *	NA	59.9% *	66.5%
Delaware	50.8% *	42.3% *	54.1% *	53.9%
District of Columbia	55.2% ^{b*}	39.3% ^b	57.9% *	85.0% ^c
Florida	49.3%	47.7% *	70.2% *	49.8%
Georgia	51.1% *	45.4% *	52.9% *	49.9%
Hawaii	76.5% *	NA	62.8%	76.9% *
Idaho	55.9% *	NA	NA	70.2%
Illinois	53.6%	40.6% ^{b,c*}	66.2% *	59.7%
Indiana	49.2% *	40.3% *	40.7% *	49.7%
Iowa	40.2% ^{b*}	NA	NA	65.7%
Kansas	43.7% *	NA	56.8% *	60.3%
Kentucky	53.0% *	NA	34.0% *	47.2%
Louisiana	39.5% *	28.5% *	44.2% *	43.9%
Maine	NA	NA	48.8% *	62.1%
Maryland	47.0% ^{b*}	60.8% *	57.9% *	70.5%
Massachusetts	46.5% *	NA	68.5% *	64.1%
Michigan	48.1% *	38.8% ^{b*}	51.0% *	65.0%
Minnesota	69.6% *	NA	58.9% *	68.7%
Mississippi	32.3% *	34.4%	41.5% *	40.5%
Missouri	60.1% *	37.7% *	48.1% *	50.1%
Montana	53.6% *	NA	55.7% *	67.9%
Nebraska	43.6% ^{b*}	NA	NA	65.5%
Nevada	50.1%	41.2% *	55.3% *	62.1%
New Hampshire	55.8% *	NA	49.1% *	66.6%
New Jersey	48.1% ^{bc}	54.5% *	73.3%	64.2%
New Mexico	51.5%	NA	65.9% *	65.9% *

State	Hispanic	Non-Hispanic Black	Non-Hispanic Other Race	Non-Hispanic White
New York	47.3% ^b	63.6% [*]	49.9% [*]	65.0%
North Carolina	55.8% [*]	37.1% ^{b*}	59.5% [*]	61.9%
North Dakota	NA	NA	48.5% [*]	63.7%
Ohio	46.2% [*]	32.0% [*]	47.2% [*]	53.3%
Oklahoma	58.6% ^{c*}	NA	38.1%	50.3%
Oregon	46.7% ^{b*}	NA	64.4% [*]	77.4%
Pennsylvania	46.1% [*]	51.1% [*]	64.7% [*]	57.7%
Rhode Island	42.0%	NA	NA	51.3%
South Carolina	46.5% [*]	37.5% [*]	41.5% [*]	47.9%
South Dakota	44.3% ^{b*}	NA	49.2% [*]	71.9% ^c
Tennessee	43.4% [*]	47.9% [*]	NA	54.4%
Texas	50.9%	57.4%	57.5%	58.9%
Utah	52.1% ^{b*}	NA	64.4% [*]	73.6%
Vermont	NA	NA	NA	66.1%
Virginia	60.8% [*]	59.9% [*]	67.1% [*]	61.6%
Washington	63.8% [*]	NA	68.3% [*]	74.1%
West Virginia	NA	NA	40.3% [*]	37.5%
Wisconsin	35.0% ^{b*}	NA	49.3% [*]	72.3%
Wyoming	49.5% [*]	NA	NA	63.6%
United States	49.9% ^{b,c}	46.5% ^{b,c}	56.9%	60.1%

Notes:

States listed as “NA” indicate that data were suppressed because there were fewer than 30 respondents.

^aIndicates statistically significant difference with Non-Hispanic Black (p < 0.05, after a Bonferroni correction for making multiple comparisons between race/ethnic groups)

^bIndicates statistically significant difference with Non-Hispanic White (p < 0.05, after a Bonferroni correction for making multiple comparisons between race/ethnic groups)

^cIndicates statistically significant difference with Non-Hispanic Other Race (p < 0.05, after a Bonferroni correction for making multiple comparisons between race/ethnic groups)

*Indicates unreliable data due to sample size limitations. These data have confidence intervals of more than 20 percentage points or there was no variation in the cell (i.e., 0% or 100% of respondents indicated this response).

Source: Centers for Disease Control and Prevention, National Center for Immunization and Respiratory Diseases. (2020). *The 2018 National Immunization Survey - Child [Dataset]*. <http://www.cdc.gov/vaccines/imz-managers/nis/datasets.html>

Table J. State adopted Medicaid expansion under the ACA, 2020

State	
Alabama	No
Alaska	Yes
Arizona	Yes
Arkansas	Yes
California	Yes
Colorado	Yes
Connecticut	Yes
Delaware	Yes
District of Columbia	Yes
Florida	No
Georgia	No
Hawaii	Yes
Idaho	Yes
Illinois	Yes
Indiana	Yes
Iowa	Yes
Kansas	No
Kentucky	Yes
Louisiana	Yes
Maine	Yes
Maryland	Yes
Massachusetts	Yes
Michigan	Yes
Minnesota	Yes
Mississippi	No
Missouri	Yes
Montana	Yes
Nebraska	Yes
Nevada	Yes
New Hampshire	Yes
New Jersey	Yes
New Mexico	Yes
New York	Yes
North Carolina	No
North Dakota	Yes
Ohio	Yes

State	
Oklahoma	Yes
Oregon	Yes
Pennsylvania	Yes
Rhode Island	Yes
South Carolina	No
South Dakota	No
Tennessee	No
Texas	No
Utah	Yes
Vermont	Yes
Virginia	Yes
Washington	Yes
West Virginia	Yes
Wisconsin	No
Wyoming	No
United States	NA

Source: Kaiser Family Foundation. (2020). *Status of state action on the Medicaid expansion decisions: Interactive table*. <https://www.kff.org/medicaid/issue-brief/status-of-state-medicaid-expansion-decisions-interactive-map/>

Table K. State efforts to extend Medicaid coverage beyond 60 days postpartum, 2020

State	
Alabama	No law beyond mandatory 60 days
Alaska	No law beyond mandatory 60 days
Arizona	No law beyond mandatory 60 days
Arkansas	No law beyond mandatory 60 days
California	Law covering either a) some women but not all, or b) all women but for less than 1 year
Colorado	No law beyond mandatory 60 days
Connecticut	No law beyond mandatory 60 days
Delaware	No law beyond mandatory 60 days
District of Columbia	No law beyond mandatory 60 days
Florida	No law beyond mandatory 60 days
Georgia	Law covering either a) some women but not all, or b) all women but for less than 1 year
Hawaii	No law beyond mandatory 60 days
Idaho	No law beyond mandatory 60 days
Illinois	Law covering all women for 1 year post-partum
Indiana	No law beyond mandatory 60 days
Iowa	No law beyond mandatory 60 days
Kansas	No law beyond mandatory 60 days
Kentucky	No law beyond mandatory 60 days
Louisiana	No law beyond mandatory 60 days
Maine	No law beyond mandatory 60 days
Maryland	No law beyond mandatory 60 days
Massachusetts	No law beyond mandatory 60 days
Michigan	No law beyond mandatory 60 days
Minnesota	No law beyond mandatory 60 days
Mississippi	No law beyond mandatory 60 days
Missouri	Law covering either a) some women but not all, or b) all women but for less than 1 year
Montana	No law beyond mandatory 60 days
Nebraska	No law beyond mandatory 60 days
Nevada	No law beyond mandatory 60 days
New Hampshire	No law beyond mandatory 60 days
New Jersey	Law covering either a) some women but not all, or b) all women but for less than 1 year
New Mexico	No law beyond mandatory 60 days
New York	No law beyond mandatory 60 days

State

North Carolina	No law beyond mandatory 60 days
North Dakota	No law beyond mandatory 60 days
Ohio	No law beyond mandatory 60 days
Oklahoma	No law beyond mandatory 60 days
Oregon	No law beyond mandatory 60 days
Pennsylvania	No law beyond mandatory 60 days
Rhode Island	No law beyond mandatory 60 days
South Carolina	No law beyond mandatory 60 days
South Dakota	No law beyond mandatory 60 days
Tennessee	No law beyond mandatory 60 days
Texas	Law covering either a) some women but not all, or b) all women but for less than 1 year
Utah	No law beyond mandatory 60 days
Vermont	No law beyond mandatory 60 days
Virginia	No law beyond mandatory 60 days
Washington	No law beyond mandatory 60 days
West Virginia	No law beyond mandatory 60 days
Wisconsin	No law beyond mandatory 60 days
Wyoming	No law beyond mandatory 60 days
United States	NA

Note: Bills that have been introduced but not enacted are not counted.

Source: The American College of Obstetricians and Gynecologists. (2020). *Policy priorities - extend postpartum Medicaid coverage*. <https://www.acog.org/advocacy/policy-priorities/extend-postpartum-medicaid-coverage>

Table L. State Medicaid policy requires, recommends, or allows maternal depression screenings during well-child visits, 2020

State	
Alabama	Recommended
Alaska	No Policy
Arizona	No Policy
Arkansas	No Policy
California	Recommended
Colorado	Allowed
Connecticut	Allowed
Delaware	Recommended
District of Columbia	Recommended
Florida	No Policy
Georgia	Required
Hawaii	Recommended
Idaho	Recommended
Illinois	Recommended
Indiana	Recommended
Iowa	Recommended
Kansas	No Policy
Kentucky	Recommended
Louisiana	Allowed
Maine	Allowed
Maryland	Required
Massachusetts	Recommended
Michigan	Allowed
Minnesota	Recommended
Mississippi	Required
Missouri	Allowed
Montana	Recommended
Nebraska	No Policy
Nevada	Allowed
New Hampshire	No Policy
New Jersey	No Policy
New Mexico	Required
New York	Allowed
North Carolina	Recommended
North Dakota	Recommended
Ohio	Recommended

State	
Oklahoma	Allowed
Oregon	Allowed
Pennsylvania	Required
Rhode Island	Recommended
South Carolina	Recommended
South Dakota	Recommended
Tennessee	Recommended
Texas	Recommended
Utah	Recommended
Vermont	Recommended
Virginia	Allowed
Washington	Required
West Virginia	Recommended
Wisconsin	Allowed
Wyoming	Recommended
United States	NA

Source: National Academy for State Health Policy. (2020). *Medicaid policies for maternal depression screening during well-child visits, by state*. <https://healthychild.nashp.org/wp-content/uploads/2020/03/Mat-Depression-Screen-chart-3.20.20.pdf>

Table M. Percentage of eligible infants who participated in WIC, 2017

State	
Alabama	89.4%
Alaska	56.0%
Arizona	74.4%
Arkansas	87.6%
California	81.6%
Colorado	62.5%
Connecticut	91.0%
Delaware	71.0%
District of Columbia	89.0%
Florida	81.8%
Georgia	70.2%
Hawaii	65.5%
Idaho	59.0%
Illinois	80.4%
Indiana	77.9%
Iowa	82.3%
Kansas	62.7%
Kentucky	78.9%
Louisiana	85.7%
Maine	67.0%
Maryland	100.0%
Massachusetts	74.8%
Michigan	90.8%
Minnesota	85.6%
Mississippi	100.0%
Missouri	80.3%
Montana	56.7%
Nebraska	75.7%
Nevada	73.0%
New Hampshire	44.6%
New Jersey	79.4%
New Mexico	63.7%
New York	78.2%
North Carolina	81.6%
North Dakota	68.7%
Ohio	91.5%
Oklahoma	79.6%

State	
Oregon	69.8%
Pennsylvania	84.4%
Rhode Island	96.4%
South Carolina	80.1%
South Dakota	70.1%
Tennessee	80.2%
Texas	79.8%
Utah	54.5%
Vermont	80.1%
Virginia	73.8%
Washington	62.0%
West Virginia	73.9%
Wisconsin	74.1%
Wyoming	68.4%
United States	79.3%

Source: United States Department of Agriculture, Food and Nutrition Service. (2020). *WIC 2017 eligibility and coverage rates*. <https://www.fns.usda.gov/wic-2017-eligibility-and-coverage-rates>

Table N. State has a paid family leave program, 2019

State	
Alabama	No
Alaska	No
Arizona	No
Arkansas	No
California	Yes
Colorado	No
Connecticut	Yes
Delaware	No
District of Columbia	Yes
Florida	No
Georgia	No
Hawaii	No
Idaho	No
Illinois	No
Indiana	No
Iowa	No
Kansas	No
Kentucky	No
Louisiana	No
Maine	No
Maryland	No
Massachusetts	Yes
Michigan	No
Minnesota	No
Mississippi	No
Missouri	No
Montana	No
Nebraska	No
Nevada	No
New Hampshire	No
New Jersey	Yes
New Mexico	No
New York	Yes
North Carolina	No
North Dakota	No
Ohio	No

State	
Oklahoma	No
Oregon	Yes
Pennsylvania	No
Rhode Island	Yes
South Carolina	No
South Dakota	No
Tennessee	No
Texas	No
Utah	No
Vermont	No
Virginia	No
Washington	Yes
West Virginia	No
Wisconsin	No
Wyoming	No
United States	NA

Source: National Partnership for Women and Families. (2021). *State paid family and medical leave insurance laws*. <http://www.nationalpartnership.org/research-library/work-family/paid-leave/state-paid-family-leave-laws.pdf>

Table O. Percentage of infants/toddlers receiving evidence-based home visiting services, 2018

State	
Alabama	0.8%
Alaska	1.8%
Arizona	3.3%
Arkansas	1.2%
California	1.0%
Colorado	2.9%
Connecticut	2.9%
Delaware	2.7%
District of Columbia	1.5%
Florida	2.7%
Georgia	0.7%
Hawaii	1.4%
Idaho	2.0%
Illinois	2.4%
Indiana	4.2%
Iowa	4.1%
Kansas	6.5%
Kentucky	4.5%
Louisiana	1.6%
Maine	5.5%
Maryland	1.2%
Massachusetts	1.2%
Michigan	2.2%
Minnesota	2.2%
Mississippi	0.5%
Missouri	5.4%
Montana	3.2%
Nebraska	1.1%
Nevada	0.2%
New Hampshire	1.1%
New Jersey	2.5%
New Mexico	1.8%
New York	1.3%
North Carolina	2.5%
North Dakota	1.4%
Ohio	3.1%

State

Oklahoma	3.5%
Oregon	3.4%
Pennsylvania	2.8%
Rhode Island	6.7%
South Carolina	1.8%
South Dakota	1.6%
Tennessee	0.8%
Texas	0.7%
Utah	0.8%
Vermont	2.5%
Virginia	1.6%
Washington	2.3%
West Virginia	2.8%
Wisconsin	2.2%
Wyoming	2.5%
United States	2.0%

Note: The denominator is the number of children ages 0-2 who could benefit from home visiting according to the source document, which is calculated as the number of children ages 0-2 based on the American Community Survey.

Source: National Home Visiting Resource Center. (2019). *2019 home visiting yearbook - state profile information*. <https://nhvrc.org/yearbook/2020-yearbook/state-tribal-landscape/>

Endnotes

1. Tikkanen, R., Gunja, M. Z., FitzGerald, M., & Zephyrin, L. (2020). *Maternal mortality and maternity care in the United States compared to 10 other developed countries*. The Commonwealth Fund. <https://www.commonwealthfund.org/publications/issue-briefs/2020/nov/maternal-mortality-maternity-care-us-compared-10-countries#:~:text=In%202018%2C%20there%20were%2017,%2C%20Norway%2C%20and%20New%20Zealand>
2. Tikkanen, R., Gunja, M. Z., FitzGerald, M., & Zephyrin, L. (2020). *Maternal mortality and maternity care in the United States compared to 10 other developed countries*. The Commonwealth Fund. <https://www.commonwealthfund.org/publications/issue-briefs/2020/nov/maternal-mortality-maternity-care-us-compared-10-countries#:~:text=In%202018%2C%20there%20were%2017,%2C%20Norway%2C%20and%20New%20Zealand>.
3. Annie E. Casey Foundation, KIDS COUNT Data Center. (2020). *Infant mortality by race in the United States* [Data set]. <https://datacenter.kidscount.org/data/tables/11051-infant-mortality-by-race?loc=1&loct=1#detailed/1/any/false/1729,37/10,11,9,12,1,13,185/21385,21386>
4. The World Bank, World Development Indicators. (n.d.). *Mortality rate, infant (per 1,000 live births)* [Data file]. <https://data.worldbank.org/indicator/SP.DYN.IMRT.IN>
5. Andrews, K., Parekh, J., & Peckoo, S. (2019). *How to embed a racial and ethnic equity perspective in research. Practical guidance for the research process*. Child Trends. https://www.childtrends.org/wp-content/uploads/2019/09/RacialEthnicEquityPerspective_ChildTrends_October2019.pdf
6. Andrews, K., Parekh, J., & Peckoo, S. (2019). *How to embed a racial and ethnic equity perspective in research. Practical guidance for the research process*. Child Trends. https://www.childtrends.org/wp-content/uploads/2019/09/RacialEthnicEquityPerspective_ChildTrends_October2019.pdf
7. Gross, E. (2020). *Equitable research communication guidelines*. Child Trends. <https://www.childtrends.org/publications/equitable-research-communication-guidelines>
8. Brown, T. H., Richardson, L. J., Hargrove, T. W., & Thomas, C. S. (2016). Using multiple-hierarchy stratification and life course approaches to understand health inequalities: The intersecting consequences of race, gender, SES, and age. *Journal of health and social behavior*, 57(2), 200-222. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4905600/>
9. Vilda, D., Wallace, M., Dyer, L., Harville, E., & Theall, K. (2019). Income inequality and racial disparities in pregnancy-related mortality in the US. *SSM - Population Health*, 9, 100477. <https://doi.org/10.1016/j.ssmph.2019.100477>
10. Sternthal, M. J., Slopen, N., & Williams, D. R. (2011). Racial disparities in health: How much does stress really matter? *Du Bois Review*, 8(1), 95-113.
11. Galea, S., Tracy, M., Hoggatt, K. J., DiMaggio, C., & Karpati, A. (2011). Estimated deaths attributable to social factors in the United States. *American Journal of Public Health*, 101(8), 1456-1465.
12. Geronimus, A.T. (1992). The weathering hypothesis and the health of African-American women and infants: Evidence and speculations. *Ethnicity & Disease*, 2(3), 207-221.

13. Geronimus, A. T., Hicken, M., Keene, D., & Bound, J. (2006). "Weathering" and age patterns of allostatic load scores among Blacks and whites in the United States. *American Journal of Public Health*, 96(5), 826-833.
14. Collins, J. W., David, R. J., Handler, A., Wall, S., & Andes, S. (2004), Very low birthweight in African American infants: the role of maternal exposure to interpersonal racial discrimination. *American Journal of Public Health*, 94(12), 2132-2138.
15. Geronimus, A. T. (1999). Black/white differences in the relationship of maternal age to birthweight: A population-based test of the weathering hypothesis. *Social Science & Medicine*, 42(4), 589-597. [https://doi.org/10.1016/0277-9536\(95\)00159-X](https://doi.org/10.1016/0277-9536(95)00159-X)
16. Din-Dzietham, R. & Hertz-Picciotto, (1998). Infant mortality differences between whites and African Americans: The effect of maternal education. *American Journal of Public Health*, 88(4), 651-656.
17. The Annie E. Casey Foundation. (2014). *Race for results: Building a path to opportunity for all children*. KIDS COUNT Policy Report. Baltimore: Author.
18. Sims, M., Sims, T. L., & Bruce, M. A. (2007). Urban poverty and infant mortality rate disparities. *Journal of the National Medical Association*, 99(4), 349-356.
19. Kumanyika, S. K., Morssink, C. B., & Nestle, M. (2001). Minority women and advocacy for women's health. *American journal of public health*, 91(9), 1383-1388. doi:10.2105/ajph.91.9.1383
20. Blakemore, E. (2016). *The little-known history of the forced sterilization of Native American women*. JSTOR Daily. <https://daily.jstor.org/the-little-known-history-of-the-forced-sterilization-of-native-american-women/>
21. Amnesty International. (2010). *Deadly delivery. The maternal health care crisis in the U.S.A.* <https://www.amnesty.org/download/Documents/36000/amr510072010en.pdf>
22. Neel, J. (October 24, 2017). *Poll: Most Americans think their own group faces discrimination*. National Public Radio. <https://www.npr.org/sections/health-shots/2017/10/24/559116373/poll-most-americans-think-their-own-group-faces-discrimination>
23. Hsiao, B., Bhalla, S., Mattocks, K., & Fraenkel, L. (2018). Understanding the Factors That Influence Risk Tolerance Among Minority Women: A Qualitative Study. *Arthritis care & research*, 70(11), 1637-1645. <https://doi.org/10.1002/acr.23542>
24. Centers for Medicare & Medicaid Service. (2019). *Improving access to maternal health care in rural communities*. <https://www.cms.gov/About-CMS/Agency-Information/OMH/equity-initiatives/rural-health/09032019-Maternal-Health-Care-in-Rural-Communities.pdf>
25. Artiga, S., Arguello, R., & Duckett, P. (2013). *Health coverage and care for American Indians and Alaska Natives*. Kaiser Family Foundation. <https://www.kff.org/racial-equity-and-health-policy/issue-brief/health-coverage-and-care-for-american-indians-and-alaska-natives/#:~:text=Nearly%20one%20in%20three%20American,do%20not%20offer%20health%20coverage.>
26. Escarce, J. J. & Kapur, K. (2006). Access to and quality of health care. In Tienda, M. & Mitchell, F. (Eds.), *Hispanics and the Future of America*. <https://www.ncbi.nlm.nih.gov/books/NBK19910/>

27. Novoa, C. & Taylor, J. (2018). *Exploring African Americans' high maternal and infant death rates*. Center for American Progress. https://cdn.americanprogress.org/content/uploads/2018/01/29114454/012918_MaternalInfantMortalityRacialDisparities-brief.pdf
28. Matthews, T. J., MacDorman, M. F., & Menacker, F. (2002). Infant mortality statistics from the 1999 period linked birth/infant death data set. *National Vital Statistics Reports*, 50(4). https://www.cdc.gov/nchs/data/nvsr/nvsr50/nvsr50_04.pdf
29. Howell, E. A., & Zeitlin, J. (2017). Improving hospital quality to reduce disparities in severe maternal morbidity and mortality. *Seminars in perinatology*, 41(5), 266-272. <https://doi.org/10.1053/j.semperi.2017.04.002>
30. Howell, E. A., Egorova, N., Balbierz, A., Zeitlin, J., & Hebert, P. L. (2016). Black-white differences in severe maternal morbidity and site of care. *American journal of obstetrics and gynecology*, 214(1), 122.e1-122.e7. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4698019/>
31. Hoffman, K. M., Trawalter, S., Axt, J. R. & Norman Oliver, M. (2016). Racial bias in paid assessment and treatment recommendations, and false beliefs about biological differences between blacks and whites. *Proceedings of the National Academy of Sciences*, 113(6), 4296-4301. doi: 10.1073/pnas.1516047113
32. Paradies, Y., Truong, M., & Priest, N. (2014). A systematic review of the extent and measurement of healthcare provider racism. *Journal of general internal medicine*, 29(2), 364-387. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3912280/>
33. Altman, M. R., Oseguera, T., McLemore, M. R., Kantrowitz-Gordon, I., Franck, L. S., & Lyndon, A. (2019). Information and power: Women of color's experience interacting with health care providers in pregnancy and birth. *Social Science & Medicine*. doi: 10.1016/j.socscimed.2019.112491.
34. Hsiao, B., Bhalla, S., Mattocks, K., & Fraenkel, L. (2018). Understanding the factors that influence risk tolerance among minority women: A qualitative study. *Arthritis care & research*, 70(11), 1637-1645. <https://doi.org/10.1002/acr.23542>
35. Pritlove, C., Juando-Prats, C., Ala-Ileppilami, K., & Parsons, J. A. (2019). The good, the bad, and the ugly of implicit bias. *Lancet*, 393, 502 - 504. [https://www.thelancet.com/pdfs/journals/lancet/PIIS0140-6736\(18\)32267-0.pdf](https://www.thelancet.com/pdfs/journals/lancet/PIIS0140-6736(18)32267-0.pdf)
36. Dutchen, S. (n.d.). *Field correction. Race-based medicine, deeply embedded in clinical decision making, is being scrutinized and challenged*. Harvard Medicine. <https://hms.harvard.edu/magazine/racism-medicine/field-correction>
37. Escarce, J. J. & Kapur, K. (2006). Access to and quality of health care. In Tienda, M. & Mitchell, F. (Eds.), *Hispanics and the Future of America*. <https://www.ncbi.nlm.nih.gov/books/NBK19910/>
38. Artiga, S., Arguello, R., & Duckett, P. (2013). *Health coverage and care for American Indians and Alaska Natives*. Kaiser Family Foundation. <https://www.kff.org/racial-equity-and-health-policy/issue-brief/health-coverage-and-care-for-american-indians-and-alaska-natives/#:~:text=Nearly%20one%20in%20three%20American,do%20not%20offer%20health%20coverage.>

39. Artiga, S., Arguello, R., & Duckett, P. (2013). *Health coverage and care for American Indians and Alaska Natives*. Kaiser Family Foundation. <https://www.kff.org/racial-equity-and-health-policy/issue-brief/health-coverage-and-care-for-american-indians-and-alaska-natives/#:~:text=Nearly%20one%20in%20three%20American,do%20not%20offer%20health%20coverage.>
40. Oysterman, M. J. K. & Martin, J. A. (2018). Timing and adequacy of prenatal care in the United States, 2016. *National Vital Statistics Reports*, 67(3). https://www.cdc.gov/nchs/data/nvsr/nvsr67/nvsr67_03.pdf
41. Martin, J. A., Hamilton, B. E., Osterman, M.J. K., and Driscoll, A.K. Births: Final data for 2018. *National Vital Statistics Reports*, 68(13), 1-46. Table 13. https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf
42. Ayers, B.L., Purvis, R.S., Bing, W.I. *et al.* Structural and Socio-cultural Barriers to Prenatal Care in a US Marshallese Community. *Matern Child Health J* 22, 1067–1076 (2018). <https://doi.org/10.1007/s10995-018-2490-5>
43. Johnson, M. B. (2020). Prenatal care for American Indian Women. *The American Journal of Maternal/Child Nursing*, 20(4), 221-227. doi: 10.1097/NMC.0000000000000633
44. Johnson, M. B. (2020). Prenatal care for American Indian Women. *The American Journal of Maternal/Child Nursing*, 20(4), 221-227. doi: 10.1097/NMC.0000000000000633
45. Ayers, B.L., Purvis, R.S., Bing, W.I. *et al.* Structural and Socio-cultural Barriers to Prenatal Care in a US Marshallese Community. *Matern Child Health J* 22, 1067–1076 (2018). <https://doi.org/10.1007/s10995-018-2490-5>
46. Center for Disease Control and Prevention. (2020). *Preterm birth*. <https://www.cdc.gov/reproductivehealth/maternalinfanthealth/pretermbirth.htm>
47. Martin, J. A., Hamilton, B. E., Osterman, M.J. K., and Driscoll, A.K. Births: Final data for 2018. *National Vital Statistics Reports*, 68(13), 1-46. Table 13. https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf
48. Shapiro, G. D., Fraser, W. D., Frasch, M. G., & Séguin, J. R. (2013). Psychosocial stress in pregnancy and preterm birth: associations and mechanisms. *Journal of perinatal medicine*, 41(6), 631–645. <https://doi.org/10.1515/jpm-2012-0295>
49. Martin, J. A., Hamilton, B. E., Osterman, M.J.K., & Driscoll, A. K. (2019). Births: Final data for 2018. *National Vital Statistics Reports*, 68(13), 1-46. https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf
50. University of Rochester Medical Center. (n.d.). *Low birth weight*. <https://www.urmc.rochester.edu/encyclopedia/content.aspx?contenttypeid=90&contentid=p02382>
51. Martin, J. A., Hamilton, B. E., Osterman, M.J. K., and Driscoll, A.K. (2019). Births: Final data for 2018. *National Vital Statistics Reports*, 68(13), 1-46. Table 13. https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_13-508.pdf
52. Geronimus A. T. (1996). Black/white differences in the relationship of maternal age to birthweight: a population-based test of the weathering hypothesis. *Social science & medicine* (1982), 42(4), 589–597. [https://doi.org/10.1016/0277-9536\(95\)00159-x](https://doi.org/10.1016/0277-9536(95)00159-x)

53. David, R. J. & Collins, J. W. (1997). Differing birth weight among infants of U.S.-born Blacks, African-born Blacks, and U.S.-born Whites. *The New England Journal of Medicine*, 337, 1209-1214. doi: 10.1056/NEJM199710233371706
54. Driscoll, A.K. & Rossen, L.M. (2020). Quarterly provisional estimates for infant mortality, 2017-Quarter 4, 2019. National Center for Health Statistics, National Vital Statistics System, Vital Statistics Rapid Release Program. <https://www.cdc.gov/nchs/nvss/vsrr/infant-mortality-dashboard.htm>
55. National Center for Health Statistics. (2019). Infant mortality in the United States, 2017: Data from the period linked birth/infant death file. *National Vital Statistics Reports*, 68(10). https://www.cdc.gov/nchs/data/nvsr/nvsr68/nvsr68_10_tables-508.pdf
56. The World Bank, World Development Indicators. (n.d.). *Mortality rate, infant (per 1,000 live births)* [Data file]. <https://data.worldbank.org/indicator/SP.DYN.IMRT.IN>
57. Centers for Disease Control and Prevention. (2020). *Infant mortality*. <https://www.cdc.gov/reproductivehealth/maternalinfanthealth/infantmortality.htm>
58. Centers for Disease Control and Prevention. (2019). *Preventing pregnancy-related deaths*. <https://www.cdc.gov/reproductivehealth/maternal-mortality/preventing-pregnancy-related-deaths.html>
59. Tikkanen, R., Gunja, M. Z., FitzGerald, M., & Zephyrin, L. (2020). *Maternal mortality and maternity care in the United States compared to 10 other developed countries*. The Commonwealth Fund. <https://www.commonwealthfund.org/publications/issue-briefs/2020/nov/maternal-mortality-maternity-care-us-compared-10-countries#:~:text=In%202018%2C%20there%20were%2017,%2C%20Norway%2C%20and%20New%20Zealand>
60. Hoyert, D. L. & Minino, A. M. (2020). Maternal mortality in the United States: Changes in coding, publication, and data release, 2018. *National Vital Statistics Reports*, 69(2). <https://www.cdc.gov/nchs/data/nvsr/nvsr69/nvsr69-02-508.pdf>
61. Lu M. C. (2018). Reducing Maternal Mortality in the United States. *JAMA*, 320(12), 1237-1238. <https://doi.org/10.1001/jama.2018.11652>
62. The World Bank, World Development Indicators. (2019). *Maternal mortality ratio (modeled estimate, per 100,000 live births)*. https://data.worldbank.org/indicator/SH.STA.MMRT?most_recent_value_desc=false&view=chart
63. Building U.S. Capacity to Review and Prevent Maternal Deaths. (2018). *Report from nine maternal mortality review committees*. <https://www.cdcfoundation.org/sites/default/files/files/ReportfromNineMMRCs.pdf>
64. Riley W. J. (2012). Health disparities: gaps in access, quality and affordability of medical care. *Transactions of the American Clinical and Climatological Association*, 123, 167-174.
65. Slomski, A. (2019). Why do hundreds of U.S. women die annually in childbirth? Medical News and Perspectives. *JAMA*, 321(13), 1239-1241.
66. American College of Obstetricians and Gynecologists and the Society for Maternal-Fetal Medicine, Kilpatrick, S. K., & Ecker, J. L. (2016). Severe maternal morbidity: screening and review. *American journal of obstetrics and gynecology*, 215(3), B17-B22. <https://doi.org/10.1016/j.ajog.2016.07.050/>

67. Centers for Disease Control and Prevention. (2020). *Maternal mortality*. <https://www.cdc.gov/reproductivehealth/maternal-mortality/index.html>
68. Centers for Disease Control and Prevention. (2021). *Severe maternal morbidity in the United States*. <https://www.cdc.gov/reproductivehealth/maternalinfanthealth/severematernalmorbidity.html>
69. Fingar, K. R., Hambrick, M. M., Heslin, K. C., & Moore, J. E. (2018). *Trends and disparities in delivery hospitalizations involving severe maternal morbidity, 2006-2015*. <https://hcup-us.ahrq.gov/reports/statbriefs/sb243-Severe-Maternal-Morbidity-Delivery-Trends-Disparities.jsp>
70. Fingar, K. R., Hambrick, M. M., Heslin, K. C., & Moore, J. E. (2018). *Trends and disparities in delivery hospitalizations involving severe maternal morbidity, 2006-2015*. <https://hcup-us.ahrq.gov/reports/statbriefs/sb243-Severe-Maternal-Morbidity-Delivery-Trends-Disparities.jsp>
71. Creamer, J. (2020). *Inequalities persist despite decline in poverty for all major race and Hispanic origin groups*. United States Census Bureau. <https://www.census.gov/library/stories/2020/09/poverty-rates-for-blacks-and-hispanics-reached-historic-lows-in-2019.html>
72. Jones, K. M., Power, M. L., Queenan, J. T., & Schulkin, J. (2015). Racial and ethnic disparities in breastfeeding. *Breastfeeding medicine : the official journal of the Academy of Breastfeeding Medicine*, 10(4), 186-196. <https://doi.org/10.1089/bfm.2014.0152>
73. Jones, K. M., Power, M. L., Queenan, J. T., & Schulkin, J. (2015). Racial and ethnic disparities in breastfeeding. *Breastfeeding medicine : the official journal of the Academy of Breastfeeding Medicine*, 10(4), 186-196. <https://doi.org/10.1089/bfm.2014.0152>.
74. National Institute for Children's Health Quality. (n.d.). *Breastfeeding takes a village and, too often, Black women don't have one*. <https://www.nichq.org/insight/breastfeeding-takes-village-and-too-often-black-women-dont-have-one>
75. National Institute for Children's Health Quality. (n.d.). *The impact of institutional racism on maternal and child health*. <https://www.nichq.org/insight/impact-institutional-racism-maternal-and-child-health>
76. The Sullivan Commission. (n.d.) *Missing persons: Minorities in the health professions*. https://drum.lib.umd.edu/bitstream/handle/1903/22267/Sullivan_Final_Report_000.pdf?sequence=1
77. Vedam, S., Stoll, K., MacDorman, M., Declercq, E., Cramer, R., Cheyney, M., Fischer, T., Butt, E., Yang, Y. T., & Powell Kennedy, J. (2018). Mapping integration of midwives across the United States: Impact on access, equity, and outcomes. *PLoS ONE*, 13(2). <https://journals.plos.org/plosone/article?id=10.1371/journal.pone.0192523>
78. American College of Nurse-Midwives. (2012). *Definition of midwifery and scope of practice of certified nurse-midwives and certified midwives*. <https://www.midwife.org/ACNM/files/ACNMLibraryData/UPLOADFILENAME/000000000266/Definition%20of%20Midwifery%20and%20Scope%20of%20Practice%20of%20CNMs%20and%20CMs%20Feb%202012.pdf>
79. Midwives Alliance of North America. (n.d.). *The midwives model of care*. <https://mana.org/about-midwives/midwifery-model>
80. Muza, S. (2019). *Meet Native American midwife Nicolle Gonzales, found of Changing Woman Initiative and celebrate day of the midwife*. DONA International. <https://www.dona.org/meet-native-american-midwife-nicolle-gonzales-founder-of-changing-woman-initiative-and-celebrate-day-of-the-midwife/>

81. Muse, S. (2018). *Setting the standard for holistic care of and for Black women*. Black Mamas Matter Alliance. http://blackmamasmatter.org/wp-content/uploads/2018/04/BMMA_BlackPaper_April-2018.pdf
82. Picklesimer, A.H., Billings, D., Hale, N., Blackhurst, D., & Covington-Kolb, S. (2012). The effect of CenteringPregnancy group prenatal care on preterm birth in a low-income population. *American journal of obstetrics and gynecology*, 206(5), 415.
83. Ickovics, J.R., Kershaw, T.S., Westdahl, C., Magriples, U., Massey, Z., Reynolds, H., & Rising, S.S. (2007). Group prenatal care and perinatal outcomes. *Obstetrics and gynecology*, 110(2), 330-339.
84. March of Dimes. (2019). *2019 March of Dimes report card: Healthy moms, strong babies*. https://www.marchofdimes.org/materials/MOD2019_REPORT_CARD_and_POLICY_ACTIONS_BOOKLETv72.pdf
85. Ickovics, J.R., Kershaw, T.S., Westdahl, C., Magriples, U., Massey, Z., Reynolds, H., & Rising, S.S. (2007). Group prenatal care and perinatal outcomes. *Obstetrics and gynecology*, 110(2), 330-339.
86. Kettrey, H.H. & Steinka-Fry, K. (2020). Effects of March of Dimes Supportive Pregnancy Care on maternal and infant health across diverse patient populations: A quasi-experimental multi-site pilot study. *Prevention science*, 21(3), 293-307. doi: 10.1007/s11121-019-01083-5
87. Ickovics, J. R., Kershaw, T. S., Westdahl, C., Magriples, U., Massey, Z., Reynolds, H., & Rising, S. S. (2007). Group prenatal care and perinatal outcomes: a randomized controlled trial. *Obstetrics and gynecology*, 110(2 Pt 1), 330-339. <https://doi.org/10.1097/01.AOG.0000275284.24298.23>
88. Thielen K. (2012). Exploring the group prenatal care model: a critical review of the literature. *The Journal of perinatal education*, 21(4), 209-218. <https://doi.org/10.1891/1058-1243.21.4.209>
89. Trudnak, T. E., Arboleda, E., Kirby, R. S., & Perrin, K. (2013). Outcomes of Latina women in CenteringPregnancy group prenatal care compared with individual prenatal care. *Journal of midwifery & women's health*, 58(4), 396-403. <https://doi.org/10.1111/jmwh.12000>
90. DONA International. (n.d.). *What is a doula?* <https://www.dona.org/what-is-a-doula/>
91. Kozhimannil, K. B., Hardeman, R. R., Alarid-Escudero, F., Vogelsang, C. A., Blauer-Peterson, C., & Howell, E. A. (2016). Modeling the Cost-Effectiveness of Doula Care Associated with Reductions in Preterm Birth and Cesarean Delivery. *Birth (Berkeley, Calif.)*, 43(1), 20-27. <https://doi.org/10.1111/birt.12218>
92. Kozhimannil, K. B., Attanasio, L. B., Hardeman, R. R., & O'Brien, M. (2013). Doula care supports near-universal breastfeeding initiation among diverse, low-income women. *Journal of midwifery & women's health*, 58(4), 378-382.
93. Gebel, C. & Hodin, S. (2020). *Expanding access to doula care: State of the union*. Maternal Health Task Force at the Harvard Chan School, Center of Excellence in Maternal and Child Health. <https://www.mhtf.org/2020/01/08/expanding-access-to-doula-care/>
94. Health Connect One. (2020). *Sustainable funding for doula programs*. https://www.healthconnectone.org/wp-content/uploads/2020/09/Sustainable_Funding_for_Doula_Programs_A_Study_single_51.pdf
95. Health Connect One. (2020). *Sustainable funding for doula programs*. https://www.healthconnectone.org/wp-content/uploads/2020/09/Sustainable_Funding_for_Doula_Programs_A_Study_single_51.pdf

96. Gebel, C. & Hodin, S. (2020). *Expanding access to doula care: State of the union*. Maternal Health Task Force at the Harvard Chan School, Center of Excellence in Maternal and Child Health. <https://www.mhtf.org/2020/01/08/expanding-access-to-doula-care/>
97. Witt, A. M., Smith, S., Mason, M. J., & Flocke, S. A. (2012). Integrating routine lactation consultant support into a pediatric practice. *Breastfeeding medicine : the official journal of the Academy of Breastfeeding Medicine*, 7(1), 38–42. <https://doi.org/10.1089/bfm.2011.0003>
98. Kulka, T. R., Jensen, E., McLaurin, S., Woods, E., Kotch, J., Labbok, M., Bowling, M., Dardess, P., & Baker, S. (2011). Community based participatory research of breastfeeding disparities in African American women. *Infant, child & adolescent nutrition*, 3(4), 233–239. <https://doi.org/10.1177/1941406411413918>
99. Clark M. (2020). *States can do more to improve Medicaid and CHIP pregnancy and postpartum coverage, advance maternal and child health equity*. Georgetown University Health Policy Institute, Center for Children and Families. <https://ccf.georgetown.edu/2020/11/05/states-should-improve-medicaid-and-chip-pregnancy-and-postpartum-coverage-advance-maternal-and-child-health-equity/>
100. Artiga, S., Pham, O., Ranji, U., & Orgera, K. (2020). *Medicaid initiatives to improve maternal and infant health and address racial disparities*. Kaiser Family Foundation. <https://www.kff.org/report-section/medicaid-initiatives-to-improve-maternal-and-infant-health-and-address-racial-disparities-issue-brief/>
101. Guth, M., Artiga, S., & Pham, O. (2020). *Effects of ACA Medicaid expansion on racial disparities in health and health care*. Kaiser Family Foundation. <https://www.kff.org/medicaid/issue-brief/effects-of-the-aca-medicaid-expansion-on-racial-disparities-in-health-and-health-care/>
102. Long, S. K., Coughlin, T., & King, J. (2005). How well does Medicaid work in improving access to care?. *Health services research*, 40(1), 39–58. <https://doi.org/10.1111/j.1475-6773.2005.00341.x>
103. Eckert, E. (2020). *It's past time to provide continuous Medicaid coverage for one year postpartum*. <https://www.healthaffairs.org/doi/10.1377/hblog20200203.639479/full/>
104. Kaiser Family Foundation. (2021). *Status of state action on the Medicaid expansion decision* [data file]. <https://www.kff.org/health-reform/state-indicator/state-activity-around-expanding-medicaid-under-the-affordable-care-act/?currentTimeframe=0&sortModel=%7B%22colId%22:%22Location%22,%22sort%22:%22asc%22%7D>
105. Artiga, S., Pham, O., Ranji, U., & Orgera, K. (2020). *Medicaid initiatives to improve maternal and infant health and address racial disparities*. Kaiser Family Foundation. <https://www.kff.org/report-section/medicaid-initiatives-to-improve-maternal-and-infant-health-and-address-racial-disparities-issue-brief/>
106. Eckert, E. (2020). *It's past time to provide continuous Medicaid coverage for one year postpartum*. <https://www.healthaffairs.org/doi/10.1377/hblog20200203.639479/full/>
107. Artiga, S., Pham, O., Ranji, U., & Orgera, K. (2020). *Medicaid initiatives to improve maternal and infant health and address racial disparities*. Kaiser Family Foundation. <https://www.kff.org/report-section/medicaid-initiatives-to-improve-maternal-and-infant-health-and-address-racial-disparities-issue-brief/>
108. Burak, E.W. & Clark, M. (2021). *Implementing American Rescue Plan's 12-month postpartum Medicaid coverage: Federal and state actions*. Georgetown University Health Policy Institute,

Center for Children and Families. <https://ccf.georgetown.edu/2021/03/22/implementing-american-rescue-plans-12-month-postpartum-medicaid-coverage-federal-and-state-actions/>

109. Artiga, S., Pham, O., Ranji, U., & Orgera, K. (2020). *Medicaid initiatives to improve maternal and infant health and address racial disparities*. Kaiser Family Foundation. <https://www.kff.org/report-section/medicaid-initiatives-to-improve-maternal-and-infant-health-and-address-racial-disparities-issue-brief/>
110. U.S. Department of Agriculture, Food and Nutrition Service. (2020). *WIC 2017 eligibility and coverage rates*. <https://www.fns.usda.gov/wic-2017-eligibility-and-coverage-rates>
111. U.S. Department of Agriculture. (n.d.). *The special supplemental nutrition program for women, infants and children (WIC program)*. <https://fns-prod.azureedge.net/sites/default/files/wic/wic-fact-sheet.pdf>
112. Khanani, I., Elam, J., Hearn, R., Jones, C., & Maseru, N. (2010). The impact of prenatal WIC participation on infant mortality and racial disparities. *American journal of public health, 100 Suppl 1*(Suppl 1), S204-S209. <https://doi.org/10.2105/AJPH.2009.168922>
113. U.S. Department of Agriculture, Food and Nutrition Service. (2020). *WIC 2017 eligibility and coverage rates*. <https://www.fns.usda.gov/wic-2017-eligibility-and-coverage-rates>
114. U.S. Department of Agriculture, Food and Nutrition Service. (2020). *WIC 2017 eligibility and coverage rates*. <https://www.fns.usda.gov/wic-2017-eligibility-and-coverage-rates>
115. U.S. Department of Agriculture, Food and Nutrition Service. (2019). *WIC 2016 eligibility and coverage rates*. <https://www.fns.usda.gov/wic/wic-2016-eligibility-and-coverage-rates>
116. Center on Budget and Policy Priorities. (2021). *Tracking the COVID-19 recession's effects on food, housing, and employment hardships*. <https://www.cbpp.org/research/poverty-and-inequality/tracking-the-covid-19-recessions-effects-on-food-housing-and>
117. Neuberger, Z. (2020). *Streamlining and modernizing WIC enrollment*. Center on Budget and Policy Priorities <https://www.cbpp.org/research/food-assistance/streamlining-and-modernizing-wic-enrollment>
118. Neuberger, Z. (2020). *Streamlining and modernizing WIC enrollment*. Center on Budget and Policy Priorities <https://www.cbpp.org/research/food-assistance/streamlining-and-modernizing-wic-enrollment>
119. Widor, S. (2021). *WIC and WIC FMNP - American Rescue Plan Act of 2021 - program modernization*. U.S. Department of Agriculture, Food and Nutrition Service. <https://www.fns.usda.gov/wic/american-rescue-plan-act-program-modernization>
120. Kamerman, S. B. (2006). Parental Leave Policies: The Impact on Child Well-Being. In Moss, P. & O'Brien, M (Eds.), *International Review of Leave Policies and Related Research 2006* (16-21). https://www.leavenetwork.org/fileadmin/user_upload/k_leavenetwork/annual_reviews/2006_annual_report.pdf
121. Zigler, E., Muenchow, S, & Ruhm, C. J. (2012). Time off with baby: Who gets it, and who doesn't. *Zero to Three, 32*(6), 50-55. <https://eric.ed.gov/?id=EJ1002685>.
122. Zigler, E., Muenchow, S, & Ruhm, C. J. (2012). Time off with baby: Who gets it, and who doesn't. *Zero to Three, 32*(6), 50-55. <https://eric.ed.gov/?id=EJ1002685>.

123. Skinner, C. & Ochshorn, S. (2012). Paid family leave. Strengthening families and our future. National Center for Children in Poverty. Retrieved from http://www.nccp.org/publications/pdf/text_1059.pdf
124. Burtle, A., & Bezruchka, S. (2016). Population Health and Paid Parental Leave: What the United States Can Learn from Two Decades of Research. *Healthcare*, 4(2), 30. MDPI AG. <http://dx.doi.org/10.3390/healthcare4020030>
125. Plotka, R., Busch-Rossnagel, N.A. The role of length of maternity leave in supporting mother-child interactions and attachment security among American mothers and their infants. *ICEP* 12, 2 (2018). <https://doi.org/10.1186/s40723-018-0041-6>
126. Burtle, A., & Bezruchka, S. (2016). Population Health and Paid Parental Leave: What the United States Can Learn from Two Decades of Research. *Healthcare*, 4(2), 30. MDPI AG. <http://dx.doi.org/10.3390/healthcare4020030>
127. Bartel, A. P., Kim, S., Nam, J., Rossin-Slater, M., Ruhm, C., & Waldfogel, J. (2019). Racial and ethnic disparities in access to and use of paid family and medical leave: Evidence from four nationally representative data sets. *Monthly Labor Review*. <https://doi.org/10.21916/mlr.2019.2>
128. Gupta, P., Goldman, T., Hernandez, E. & Rose, M. (2018). Paid family and medical leave are critical for low-wage workers and their families. CLASP. https://www.clasp.org/sites/default/files/publications/2018/12/2018_pfmliscriticalfor_0.pdf
129. Hetrick, C. (2017). *NJ assembly approves expanding paid family leave*. Observer. <http://observer.com/2017/06/nj-assembly-approves-expanding-paid-family-leave/>
130. Klerman J., Daley, K., & Pozniak, A. (2013). *Family and medical leave in 2012: Technical report*. U.S. Department of Labor. https://www.dol.gov/sites/dolgov/files/OASP/legacy/files/TECHNICAL_REPORT_family_medical_leave_act_survey.pdf
131. The National Partnership for Women & Families. (2018). *Paid family and medical leave: A racial justice issue - and opportunity*. <https://www.nationalpartnership.org/our-work/resources/economic-justice/paid-leave/paid-family-and-medical-leave-racial-justice-issue-and-opportunity.pdf>
132. Creamer, J. (2020). *Inequalities persist despite decline in poverty for all major race and Hispanic origin groups*. United States Census Bureau. <https://www.census.gov/library/stories/2020/09/poverty-rates-for-blacks-and-hispanics-reached-historic-lows-in-2019.html>
133. Kothari, C.L., Romph, C., Bautista, T., & Lenz, D. (2017). Perinatal periods of risk analysis: Disentangling race and socioeconomic status to inform a Black infant mortality community action initiative. *Maternal and Child Health Journal*, 21, 49-58. <https://doi.org/10.1007/s10995-017-2383-z>
134. McIntosh, K., Moss, E., Nunn, R., & Shambuagh, J. (2020). *Examining the Black-White wealth gap*. Brookings. <https://www.brookings.edu/blog/up-front/2020/02/27/examining-the-black-white-wealth-gap/>