ALABAMA INSTITUTE FOR SOCIAL JUSTICE

POLICY BRIEF #4

Environmental Justice Advocacy for Alabama's Black Belt:

How Environmental Racism Impacts the State's Health and Safety

SUMMARY

Every person in America deserves to have safe air, clean water, and uncontaminated surroundings regardless of their ethnicity, their income, or where they live. However, the current governmental approach to environmental policy does not address the disproportionate extent and severity of the unjust burden that minority and low-income communities must face from hazards like pollution, toxic waste, and climate change. By working to solve environmental inequality, Alabama Institute for Social Justice (AISJ) seeks to address the harm caused by existing environmental injustices and prevent new such injustices that target these neighborhoods. By dismantling the power imbalances that are in place, we can work to fix the unhealthy living conditions associated with health inequities and climate vulnerability, and create a healthier future for those who have been denied environmental justice.

Preliminary Thoughts

Black and brown citizens are no strangers to racism – they have encountered it for generations in housing, employment, and education. But there is another factor that people of color must also grapple with: environmental racism.

No one wants a landfill or factory in their neighborhood, yet corporations, regulatory agencies, and local planning and zoning boards often find it easier to place such facilities in Black and brown communities. Communities of color are also often poor, and they are routinely purposely chosen to become new locations for polluting facilities like landfills, industrial plants, and truck depots.

People who live in poorer areas typically lack the connections with decision makers on city councils or zoning boards that could protect their interests. They are also often unable to afford hiring the legal or technical expertise they would need to fight a toxic polluter from being sited near them. Furthermore, they may lack access to information about how these polluters in their neighborhoods might affect their health over time.

Minority and low-income communities, already hard-hit by poorer medica care and a lack of supportive infrastructure, must also face a disproportionate burden from larger environmental hazards. Climate change, with its shifts in temperature, precipitation, and wind patterns, exacerbates any existing health and social inequities.

For generations now, the voices of communities of color have been the least heard within the predominantly white ecological conservation movement. But these people are the ones with the most to lose, and their vulnerability in the face of environmental injustice must be discussed.

Hazardous Substances and Toxic Waste

Power plants, incinerators, factories, and other toxic facilities are often built next to communities of color, leaving those people to bear the brunt of air pollution and toxic exposure. And while efforts to improve

general air quality in the country may be working overall, they are not applied equitably.

Across the U.S.

Back in 1987, a research study entitled *Toxic Wastes and Race in the United States* found that race was the most significant variable in determining where hazardous waste facilities would be placed [1].

Twenty years later, in 2007, the research was revisited and refined, and it still held true that the percentage of people of color was higher in areas closer to hazardous waste facilities [2]. Among those living 3 to 5 kilometers from such a facility, 35.7% of the population was people of color. Between 1-3 kilometers away, the percentage jumped to 46.1%; and within 1 kilometer it rose to 47.7% Race was still the greatest determining factor in where a hazardous waste facility would be sited, more so than socioeconomic class.

Families of color with lower incomes are particularly burdened with the health impacts from air pollution because of higher levels of poverty and relatively low rates of health insurance coverage. But they are imperiled not only by living near hazardous waste facilities, they are also forced to live with higher levels of toxic pollutants coming from industrial plants and increased highway traffic emissions from both light-duty gasoline and heavy-duty diesel vehicles as well.

Ambient particulate matter from industrial or roadway sources is responsible for 85,000 to 200,000 deaths per year. Emission sources of these particulates disproportionately expose and endanger people of color: Black people are exposed to 21% more concentrations of particulate matter than the average, while the exposure level is 18% higher than average for Asian Americans, and 11% higher for Hispanics and Latinx. Meanwhile, this exposure is statistically much lower for white people, who have 8% *less* pollution exposure than the average [3]. For almost every emission source, people of color are inequitably exposed to higher levels of dangerous particulates that can harm their health.

Many toxic pollutants are linked to increased risk of respiratory disorders, and pollution from the oil and gas industry poses additional major health threats, especially to children who suffer from asthma. Across the country, more than 750,000 summertime asthma attacks occur in children under the age of 18 due to ozone smog resulting from such pollution. Additionally, more than 2,000 asthma-related emergency room visits and over 600 respiratory-related hospital admissions occur each summer as a result of ozone smog [4].

These gas and oil industry pollutants can include benzene, which has been linked to cancer, brain damage, birth defects, and developmental and neurological disorders. For someone who lives near a well site, the cumulative cancer risks can range from 6 in a million to 10 in a million [5], which is 6 to 10 times higher than the EPA's theoretical rate of cancer development as a direct result of continually breathing air containing this chemical at certain amounts [6].

Here in Alabama

Alabama has made national news for its own toxic substances, some of which are airborne while others live within the soil and water.

Uniontown, which is in the heart of Alabama's Black Belt and has a 91% Black population, was approved in 2010 to receive 4 million cubic yards of toxic coal ash from Kingston, Tennessee, at the Arrowhead Landfill. Coal ash contains heavy metals such as mercury, lead, and arsenic.

In 2013, nearly three dozen residents living within a mile of the landfill submitted a complaint to the EPA's Office of Civil Rights, complaining of health impacts including dizziness, nausea, interrupted sleep, and

increased noise from heavy machinery, and irritation of the eyes, nose, and throat [7]. In written testimony for the U.S. Commission on Civil Rights, a Uniontown resident said that residents worry about even eating vegetables from their gardens because they fear getting sick [8]. The EPA has repeatedly dismissed civil rights investigations into the matter, leaving residents feeling unheard and unprotected.

Uniontown also has a longstanding problem with its failing sewer system. It is full of leaky, old terra-cotta pipes, which allow untreated sewage to escape. But these leaks also allow millions of gallons of rainwater into the sanitary sewer, which can easily flood the treatment system beyond capacity after just one inch of rain. In addition, the system's sprayfield has clay-heavy soil that doesn't allow water to soak back into the ground, creating a constant flow of sewage flowing into Freetown Creek [9].

The city received $4.8 million in grants from the U.S. Department of Agriculture in 2012 to address the problem, yet Uniontown continues to have issues with its sewage [9].

Area neighborhoods have soil that is deeply contaminated with arsenic, lead, and carcinogenic hydrocarbons like benzo(a)pyrene from airborne particulates, as well as from physically contaminated fill from nearby industrial plants that was used to grade home lots during residential construction decades ago [10].

The area, called the 35th Avenue Superfund Site, encompasses Collegeville, Harriman Park, and Fairmont. The EPA established the region as a superfund site so that the agency could obtain the funds to finance cleanup operations and seek reimbursement from responsible parties through settlement negotiations or legal action.

In 2014, the EPA proposed adding the 35th Avenue Superfund Site to the agency's National Priorities List, which would make the region a high-priority cleanup site. State officials opposed the listing, saying that the move would depress property values and that the state would not spend money to assist in any cleanup efforts at the site. Through April 2017, the EPA said it had removed approximately 30,000 tons of contaminated soil from 280 properties. As of 2019, none of the five potentially responsible parties for the area's pollution had agreed to settlements covering their portion of the liability for site cleanup. And the site is still not on the EPA's National Priorities List [10].

Cities with high levels of poverty – like Uniontown and the towns within north Birmingham – have limited local tax bases, resulting in insufficient funds for local governments to invest in their own sanitation solutions. Their residents continue to suffer through poor infrastructure that denies them safe sanitation and environmental health. The state of Alabama has repeatedly failed these people, in effect, punishing them for their race and their poverty.

Climate Change

Climate change and health inequities are often linked. Transportation options, energy creation and use, agricultural methods, and socioeconomic systems are all major frameworks for community living but are also key contributors to the climate crisis. These systems are constructed by powerful private and public institutions that are influenced by and continue to exert their own influence on social inequities like class and race.

Meanwhile, a community's vulnerability to climate change is often predicated on its pre-existing health status and living conditions. If a locality is low-income, its infrastructure will already be weakened and less able to respond to and rebound from the dangers presented by climate change, from temperature shifts to natural disasters. Ergo, low-income areas and communities of color are disproportionately affected by the health and economic impacts of climate change.

Extreme Temperatures

One major result of climate change is rising global temperatures. This extra heat drives regional and seasonal temperature extremes. 2019 and 2020 were among the warmest years on record for the Earth [11].

Continued rising global temperatures will lead to an increase in heat-related illnesses and deaths. Extreme temperatures can exacerbate pre-existing conditions like respiratory and cardiovascular diseases, and they can cause increases in illnesses and deaths because the body's ability to regulate its temperature is compromised [12].

As with many other societal dilemmas, the heaviest negative consequences fall on people of color and low-income communities. Black people are 40 to 59% more likely to live in areas with high projected increases in extreme temperature-related deaths. Neighborhoods with high poverty rates also have higher temperature mortality potential, especially considering how many of these low-income people are without health insurance [12].

One factor that contributes to the temperature disparities that the poor and people of color must try to survive is something as seemingly simple as inequitable distribution of tree cover in cities. Low-income city blocks across the U.S. have 62 million fewer trees than high-income blocks resulting in 15.2% less tree cover and temperatures that are 1.5°C (2.7°F) hotter than high-income blocks [13]. Having a lower income means receiving less protection from increasing temperatures.

Rising temperatures create their own danger in Alabama. The state has more than 160,000 residents living below the poverty line who are aged 65 and older or less than 5 years old, which makes them especially vulnerable to extreme heat [14]. Temperatures in Alabama have risen 2°F since the 1970s, and daily summer temperatures exceeding 95°F are common [15]. Currently, Alabama experiences around 15 days per year with a heat index above 105°F [16].

All of this means that Black and poor Alabamians are at higher risk of succumbing to heat-related illnesses and deaths, which will continue to rise as global temperatures continue to trend upward.

Natural Disasters

Climate change is expected to cause more intense and frequent precipitation events in various regions throughout the country, increasing the risk of inland and coastal flooding. Meanwhile, rising temperatures also create greater opportunities for wildfires due to higher ambient temperatures and trees that have lost their moisture.

If a natural disaster like a flood or wildfire hits a community, government aid is often sent to the area to help rebuild the city's infrastructure. However, how this aid gets dispersed is another way in which minority and low-income communities are disproportionately harmed by natural disasters.

White areas that are faced with natural disasters see an increase in average wealth after receiving aid, while Black areas actually see a decrease in wealth. White people who live in counties with at least $10 billion in damage gain nearly $126,000 in wealth. Meanwhile, Black people who live in counties with at least $10 billion in damage *lost* $27,000 [17]. So, wealth inequality ends up increasing in counties that are hit hard by these events, weakening them further in the face of future disasters, and inevitably creating even further racial and class stratification.

Low-income communities are more likely to suffer from the consequences of natural disasters due to inadequate infrastructure, a lack of insurance, and a higher likelihood of living near industrial facilities that risk toxic leaks after major storms.

Flooding

Climate change means rising sea levels. Alabama's sea level has risen 11 inches since 1966, with forecasts projecting that it will rise another 6 inches by 2032 [16].

Alabama has nearly 27,000 people who are at risk of a hundred-year coastal flood. By 2050, the state's coastal flood risk is projected to increase by 25%, adding 7,000 people to the hundred-year coastal floodplain [14].

The Alabamians who will be hardest-hit by coastal flooding will be the poor. Though the statewide poverty rate was 19% in 2015, the state's poverty rate of who lived in the hundred-year floodplain was 21% [19], meaning that more poor communities are at risk of losing their homes and being unable to economically recover from coastal flooding.

Wildfires

Changing global climate means not only increased ambient temperatures but also higher risk of wildfires. Nearly 2.8 million people in Alabama live in areas with higher vulnerability to wildfire – nearly 60% of Alabama's entire population [14].

Once again, it is the minority and low-income communities that are at higher risk of significant losses from wildfires. Communities that are predominantly Black, Hispanic and Latinx, or Indigenous are 50% more vulnerable to wildfires [19].

And just like with flooding, poor communities and communities of color are less likely to bounce back after a devastating fire.

RECOMMENDATIONS

- Change the approach to environmental policy to prevent disadvantaged communities from being disproportionately harmed.
- Elevate and empower the voices within minority and low-income communities directly impacted by environmental injustice to ensure they have a leading role in environmental policy formation.
- Invest in mitigation and resiliency efforts to address the legacy of environmental harm within impacted communities.
- Clean up remaining pollution and toxic chemicals within impacted communities and invest in infrastructure to support safe sanitation and community health.
- Ensure disaster and climate change preparedness and relief funding is directed to communities in an equitable manner, accounting for risk disparities and population vulnerabilities.
- Address shelter, transportation, health, and workforce challenges arising from both the decrease in environmental quality and increase in natural disasters associated with climate change.

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