Food Environments in North and Central Brooklyn: The Legacy of Past Policies

Over the last few decades, food has become an increasingly important issue across American cities, particularly the issue of food security in our poorest and most vulnerable neighborhoods. Much federal and local policy has focused on increasing food access to improve food security and dietary quality of those living in these high-need communities. Yet research indicates that access to healthy food is not as strong a factor in determining dietary habits as originally assumed, and areas designated as "food deserts" continue to show higher rates of obesity and diet-related chronic illnesses. Thus, where people live has clear impact on health and food consumption despite the level of access they have to healthy food.

Examining food security, diet quality, and human health in the context of the food environment has been adopted in the literature as a broad way to understand dietary patterns. The *food environment* is a term that encompasses key factors, including food access, that contribute to the dietary habits of a particular neighborhood, such as local and federal policies, race, income, poverty, and housing costs. Food environments have formed and developed over time, and therefore a look into the historical configuration of neighborhoods in relation to demographic trends will give a big picture explanation for modern food inequities.

My research builds on ideas included in movements that promote comprehensive approaches to food insecurity and unhealthy food environments, such as the environmental justice and the community food security movements that took hold in the 1990s. For this discussion, I focus on New York City. By looking at food environments in New York City over time, I frame the discussion of urban food environments in the context of historical and spatial inequality, and the policies that have created and perpetuated this inequality, to conduct a comprehensive study of urban food inequities. To better understand this connection between where people live and how they eat, I examine phenomena that are overlooked in much of the literature: how neighborhoods have changed over time, how policy influenced the development of neighborhoods, and the impact on today's food environments.

My research specifically focuses on the neighborhoods in North and Central Brooklyn, and analyzes key points of US history in relation to urban neighborhood formation. Through historical policy analysis and ArcGIS mapping technology, I identify patterns in the developments of urban food environments as they relate to modern demographics of race, income, and obesity. With a better understanding of this history and its impact on modern cities, I reframe the discussion of urban food environments to encompass all relevant factors that impact food environments.

Legacy of Redlining

In the US, inequitable distribution of resources across neighborhoods stems largely from 1930s housing appraisal policies, commonly known as redlining. In efforts to stabilize the housing market after the Great Depression, new federal policy appraised urban neighborhoods based on their "riskiness" of bank lending for housing loans. Desirable, mostly white, neighborhoods were rated "A" and outlined in green, while undesirable neighborhoods were rated "D" and outlined in red. "D" rated neighborhoods were often described as deteriorating and typically had higher populations of African Americans and immigrants. The undesirable classification effectively blocked residents of these neighborhoods from obtaining private mortgages. This policy resulted in large scale disinvestment of housing and business in these areas, causing them to further decline and concentrating poverty into redlined neighborhoods (Aaronson, n.d.).

Findings of spatial analysis

As seen in *Figure 1* below, North and Central Brooklyn was originally redlined by this policy (circled in black). These same areas today continue to be primarily black communities, are overwhelmingly low income, and also show high rates of obesity, shown in *Figures 2, 3*, and *4* (outlined in red). The legacy of this near century old policy has had a lasting effect not just seen with race and class, but on the diet-related health of these areas. Studies have shown that, in New York City, obesity and diabetes disproportionally affect low-income people of color who, as seen in these maps, have been and continue to be concentrated in historically stigmatized neighborhoods (Lim and Harris 2014).

Additionally, Figures 2, 3, and 4 show that similar trends of race, class, and obesity creep down into more southern parts of Brooklyn that were previously yellow- and blue-lined ("B" and "C" ratings; circled in yellow). This pattern is reminiscent of suburbanization trends- often referred to as 'white flight'-and NYC housing policy in the 1970s and 1980s, a time period when southern African Americans are migrating north and immigrants are moving into NYC (Culver 1982). During this time, the city's housing spending dropped by hundreds of millions of dollars due to a shift in focus for housing policy. Despite the 1968 Federal Housing Act that officially ended discriminatory housing policies, de facto disinvestment continued to persist in poorer areas of color as developers and business owners followed more affluent populations (Lemieux 2017). Thus, many areas that were originally yellow- and blue-lined declined during the 1980s as the neighborhoods became increasing diverse and lacking of purchasing power. Food retailers left with their higher paying customers to the suburbs, and already vulnerable neighborhoods were left with few options for healthy, affordable food (Rosenberg and Cohen 2018). Though the lack of access is notable, it is simply a byproduct of institutional spatial inequality that continued to develop throughout the 20th century, further explaining why diet-related health issues continue to be concentrated in poor, black neighborhoods throughout history and now into the modern era.



Conclusion

These maps show a general overview of the patterns I identified through my research, not only comparing the past to the present, but looking at the causes of trends and changes in demographics through the last century. Food environments have been shaped and reshaped by these policies, events, and demographic shifts. This historical lens into policies that perpetuate spatial inequality allows us to better understand why health trends like obesity are concentrated in this way. With the understanding that housing policy and segregation have had such a large effect on modern food environments over time, we are better able to frame the discussion of food justice and food equity to focus more on institutional inequality, thus casting a wider net into other sectors when formulating more holistic solutions to these issues.

References

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