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# CHART

Center for Health Analytics, Research & Transformation at NJHA

## NEW JERSEY'S MOST VULNERABLE COMMUNITIES:

*A Zip Code Analysis  
of Social Gaps and  
Their Impact  
on Health*



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# NEW JERSEY'S MOST VULNERABLE COMMUNITIES: *A Zip Code Analysis of Social Gaps and Their Impact on Health*

**“The power of  
community to  
create health is far  
greater than any physician,  
clinic or hospital.”**  
– Mark Hyman, MD

Social determinants of health (SDH) have an impactful role in shaping health status. Factors such as housing, food, education, employment, income, insurance coverage and access to needed services are the building blocks to improved health status. Just one of those factors alone, such as high unemployment or low high school graduation rate, can impact a community's health status. In areas where several social determinants intersect, the result can be lasting and profound health vulnerability for entire communities.

This study, conducted by the New Jersey Hospital Association's Center for Health Analytics, Research & Transformation (CHART), takes a deep dive into where and how health status and health vulnerability is poor in New Jersey. CHART evaluated 20 clinical and socioeconomic measures to score and rank the health status and vulnerability of 537 zip codes in the state. (See *Appendix A – Complete Rankings* for a listing of all zip codes and final rankings and *Appendix B – Measures* for definitions and sources for each metric.)

## SUMMARY OF FINDINGS

New Jersey ranks as the nation's 11th most healthy state in *America's Health Rankings* from the United Health Foundation and yet, CHART's data illuminates some dramatic disparities that exist within its communities.<sup>1</sup> A resident of New Vernon's 07976 zip code can expect to live 22 years longer than someone who lives in Trenton's 08608. In Millington (zip code 07946), 99.3 percent of residents have the security of health insurance. Twenty-five miles away in Newark's 07105, just six in ten residents have any kind of health insurance coverage.

This study reveals common trends – and some surprises – for those zip codes shown to be the most vulnerable in the state. While the 10 most vulnerable zip codes are centered in New Jersey's largest cities, communities large and small, urban or rural, are shown to be more vulnerable to poor health even when a single social determinant is stressed.

## NEW JERSEY'S MOST VULNERABLE ZIP CODES:

08103 – CAMDEN	08401 – ATLANTIC CITY
08608 – TRENTON	07505 – PATERSON
08104 – CAMDEN	07114 – NEWARK
08102 – CAMDEN	08105 – CAMDEN
07102 – NEWARK	07108 – NEWARK

The study found poor health status embedded in New Jersey's neediest communities. A review of the 38 lowest scoring zip codes (ranked 500 to 537) found negative commonality across many metrics. When focusing on these communities with the lowest overall scores, the following common trends emerged:

- Nearly one in five individuals lacked health insurance
- 28 percent of households receive food support through SNAP benefits
- The median household income was less than \$39,000
- 14 percent of individuals were classified as disabled
- Nearly four in ten individuals were on Medicaid
- Individuals managing two or more chronic conditions were significantly more prevalent
- 25 percent of individuals lacked a high school diploma
- Nearly three in ten births were to a teen mother
- More than 14 percent of individuals were unemployed
- Individuals managing mental health or substance use disorders were nearly two and a half times more prevalent than the statewide median
- Nearly one in ten babies born were low birth weight
- 13 percent of households were located in food desert with limited access to healthy food
- Life expectancy was 4.7 years shorter compared to the statewide median

- More than 15 percent of households had limited English proficiency
- Premature deaths (prior to age 65) were more prevalent.

## BACKGROUND

New Jersey is diverse and densely populated. With approximately 9 million residents spread over 7,350 square miles, there are 1,213 residents per square mile, making New Jersey the most densely populated state in the country, far surpassing the national average of 93 residents per square mile. Northeast counterpart states such as Rhode Island (1,022 residents per square mile), Massachusetts (890) and Connecticut (737) are all less densely populated than New Jersey.<sup>2</sup>

Health disparities are driven in part by race, ethnicity, geography, and socioeconomic status.

Where one lives within the Garden State has a significant impact on one's health status and health vulnerability. Good or poor health status does not occur independent of one's environment.

These community and environmental factors are commonly referred to as social determinants of health. Per the World Health Organization, social determinants of health include "the wider set of forces and systems shaping the conditions of daily life."<sup>3</sup> An individual's economic stability, neighborhood and built environment, education, social structure, access to healthcare, and other aspects of the environment are all social determinants of health.<sup>4-7</sup> These measures help to provide a more comprehensive understanding of the ways in which a range of social, economic, and physical factors influence individual health. Social determinants of health most often refer to both economic and social conditions affiliated with an individual's living and working environment that can make the individual more susceptible to poor health status or vulnerable to disease, in some instances more so than genetics.<sup>8,9</sup>

Courtesy: Hackensack Meridian Health



Neighborhoods can foster conditions that either reinforce or hinder the promotion of health, apart from individual lifestyle factors. Residing in a marginalized community can increase an individual's exposure to physical and psychological stressors that may have a debilitating impact on personal health. Neighborhoods with high levels of poverty may increase the likelihood of exposure to harmful environmental factors, such as poor air quality and toxins in homes. In addition, residents of such neighborhoods may be more disposed to pervasive advertising of unhealthy substances; have more limited options for acquiring healthy food; lack public transportation and spaces for physical activity and leisure; and experience more restricted opportunities for education and employment.<sup>10-13</sup>

There has been growing interest in the relationship between neighborhood characteristics and well-being. Researchers are therefore continuing to take a more in-depth look into such characteristics and how they vary across areas. The increasing focus on this topic stems largely from the growing recognition of the significance of social determinants of health.<sup>14-16</sup>

The most comprehensive studies of their kind, The Neighborhood Atlas and County Health Rankings, have examined social determinants of health on a neighborhood level throughout the United States.<sup>17,18</sup> By ranking neighborhoods based on a number of carefully selected measures, these studies have enabled researchers to measure disparities across regions; examine spatial concentrations of poverty; identify some of the most vulnerable communities; and gain a better understanding of the characteristics that define such communities.<sup>17-21</sup> CHART's analysis seeks to create a New Jersey-specific neighborhood ranking system based on a methodology similar to these studies, but with the addition of other unique measurements.

## VULNERABLE POPULATIONS

In December 2010, the U.S. Department of Health and Human Services launched the Healthy People 2020 initiative with four very focused goals:

- attain high-quality, longer lives free of preventable disease, disability, injury, and premature death;
- achieve health equity, eliminate disparities, and improve the health of all groups;
- create social and physical environments that promote good health for all; and
- promote quality of life, healthy development, and healthy behaviors across all life stages.<sup>22</sup>

The term "population health," which is defined as the health outcomes of a group of individuals, is designed to evaluate

the general health status and disparity of outcomes of a given population. Health status can vary based on a number of variables.<sup>23</sup> Despite efforts by policy makers, care providers, and individuals themselves, health status can vary significantly due to the presence of physical, emotional, environmental, socio-economic, and geographic factors.

This study is designed to identify New Jersey's most vulnerable communities from a health status perspective and gain insight into the profile of residents living in those communities. Vulnerable populations, as defined in this study, are those at risk of poor physical and psychological health, as well as poor social and economic status.

### KEY CHARACTERISTICS OF VULNERABLE POPULATIONS INCLUDE:

- **POVERTY** – individuals with low income often lack access to healthcare services, or live in communities that are compromised by environmental factors;
- **AGE** – the elderly and youth populations are more prone to poor health status;
- **RACE AND ETHNICITY** – minority populations and residents with low income are correlated to poverty and limited access to healthcare services;
- **OTHER VARIABLES** – a host of additional variables – including limited English proficiency/linguistic isolation, undocumented status, homelessness, low education levels, disabilities, and lack of medical insurance – are associated with poor health status and vulnerability.<sup>24,25</sup>

Despite efforts to eliminate disparities in health status, specific geographic regions in the state are more vulnerable to the presence of health status risk factors than others. To a great extent, individuals' current and future health status can be influenced by whether they belong to one or more vulnerable populations. Health status can also be linked to geography, since people at risk for poor health status tend to reside in the most disadvantaged parts of the state.

Understanding where health status vulnerability is most acute and identifying the underlying sources of this vulnerability is a critical step toward improving overall health status. Addressing the risk factors associated with vulnerable communities through targeted quality improvement programs and efforts to mitigate social imbalance can serve to bridge health status gaps that exist in the state. Analytically, linking medical claims to social determinants data could kindle actionable change throughout the healthcare ecosystem.

## METHODOLOGY AND DATA

### OBJECTIVES

*This research study was designed to examine the following questions:*

1. Is there a link between geographic location within New Jersey and health status or health disparities?
2. How prevalent are chronic diseases in New Jersey and do they vary by location?
3. Is there a link between social determinants – such as income, education, housing, and transportation – and health status and life expectancy?
4. What level of influence do social determinants have on maternal and infant health status?
5. Does premature death (prior to age 65) vary by geographic location?

### MEASURING HEALTH STATUS

The measurement of health status is central to the evaluation of overall population health. There can be variation in health outcomes within a given population for a variety of reasons, such as socio-economic differences. The team from CHART gathered 20 metrics to develop a scorecard of health status and health vulnerability by zip code. Identifying both individual and community dynamics that serve to increase or decrease health risk by developing an aggregated score of multiple measures allows for the creation of a single index or score for each community in the state.

### DATA SETS

Hospital inpatient and emergency department claims data alone cannot illuminate differences in health status from one community to another. For the purposes of this study, the term health status refers to the differences between one community and another in terms of the overall incidence of disease, mortality, and the presence of socio-economic factors that contribute to poor population health and increased vulnerability. Health vulnerability also relates to physical, psychological, social and environmental conditions that can contribute to lack of access to care and utilization rates.

CHART's selection of these metrics incorporates consideration of several factors. Metrics were selected based on their measurability and relevance across all communities. CHART chose metrics from publicly available data sets and developed a weighted health status/vulnerability score for each community in the state.

## RESULTS

The results revealed tremendous disparities across New Jersey communities in utilization, access, and social measures – results that correlate with health vulnerability.

*Following are closer analyses on several select indicators.*

### › **Emergency department visits with two or more chronic condition diagnoses present in a patient's record, per 1,000 population**

Chronic conditions such as hypertension, diabetes, asthma, obesity, and high cholesterol all contribute to poor health status. CHART measured the variation across zip codes and found significant differences. The statewide range by zip code was from a low of 5.6 visits per 1,000 population to a maximum of 275 visits per 1,000 population. In the 38 zip codes with the poorest health status, the median was 91.7 visits per 1,000 population, versus the statewide median of 37.2 – or 2.5 times greater.

#### TOP FIVE ZIP CODES

*(Least Vulnerable)*



**08641** – Trenton, 5.55

**07078** – Short Hills, 8.14

**08542** – Princeton, 8.20

**07704** – Fair Haven, 9.90

**07670** – Tenafly, 9.92

#### BOTTOM FIVE ZIP CODES

*(Most Vulnerable)*



**08608** – Trenton, 274.74

**08103** – Camden, 198.99

**07102** – Newark, 190.66

**08346** – Newtonville, 179.13

**08102** – Camden, 172.76

## A Deeper Dive

*Trenton zip codes top both the least vulnerable and most vulnerable lists in the number of ED visits for individuals with chronic conditions. Both areas are served by the Trenton Post Office, but beyond that commonality their characteristics are vastly different. Zip code 08641 encompasses five square miles of primarily military base housing at Joint Base McGuire-Dix-Lakehurst, with 60 percent of the residents serving in the military. The unemployment rate is 7.4 percent, the median age is 23; and the median household income is around \$63,100. Zip code 08608, meanwhile, covers several blocks of downtown Trenton, between the Mill Hill neighborhood and the Delaware River. Fourteen percent of its residents are unemployed, with a median age of 36; and a median household income of approximately \$25,000. The stark differences between these two communities are reflected in their ability to access consistent care to manage chronic health conditions.*

➤ ***Emergency department visits with a mental health or substance use disorder diagnosis present in a patient's record, per 1,000 population***

Hospital emergency departments are the 24/7 safety net for patients suffering from mental health or substance use disorders. The range for this measure was even more distressing than the chronic conditions measure. The statewide zip code range was from a low of 14.4 visits per 1,000 population to a maximum of 517 visits per 1,000 population. In the 38 zip codes with the poorest health status the median was 149.7 visits per 1,000 population versus a statewide median of 60.9 – or 2.5 times greater.

**TOP FIVE ZIP CODES**  
*(Least Vulnerable)*



- 07078** – Short Hills, 14.43
- 07670** – Tenafly, 17.23
- 07934** – Gladstone, 17.57
- 08550** – Princeton Junction, 18.48
- 08202** – Avalon, 18.86

**BOTTOM FIVE ZIP CODES**  
*(Most Vulnerable)*



- 08103** – Camden, 517.38
- 07102** – Newark, 489.33
- 08401** – Atlantic City, 421.36
- 08102** – Camden, 381.28
- 08346** – Newtonville, 371.06

➤ ***Low-acuity emergency department visits, per 1,000 population***

Patients with limited access to primary care providers or who lack health insurance often utilize the hospital emergency room for low-acuity services. CHART measured the variation across zip codes for this as well. The range was from a low of zero visits to a maximum of 75.6 visits per 1,000 population. In the 38 zip codes with the poorest health status the median was 13.7 visits per 1,000 population versus a statewide median of 4.3 – or 3.2 times greater.

**TOP FIVE ZIP CODES**  
*(Least Vulnerable)*



- 07822** – Augusta, 0.00
- 07976** – New Vernon, 0.00
- 07980** – Stirling, 0.00
- 07092** – Mountainside, 0.14
- 07927** – Cedar Knolls, 0.24

**BOTTOM FIVE ZIP CODES**  
*(Most Vulnerable)*



- 08103** – Camden, 75.57
- 07505** – Paterson, 74.07
- 08104** – Camden, 69.07
- 07501** – Paterson, 67.91
- 08105** – Camden, 51.32

➤ **Life expectancy**

The statewide variation in life expectancy spans 22 years, with the life expectancy in the weakest performing zip code at 69.2 years and the zip code with the longest life expectancy at 91.4. The median life expectancy in the 38 zip codes with the poorest health status is 75.7 years, versus a statewide median of 80.4 years – or 4.7 years shorter.

**TOP FIVE ZIP CODES**  
*(Least Vulnerable)*



**07976 – New Vernon, 91.4**  
**08542 – Princeton, 89.7**  
**07605 – Leonia, 87.2**  
**08553 – Rocky Hill, 87.2**  
**07452 – Glen Rock, 87.0**

**BOTTOM FIVE ZIP CODES**  
*(Most Vulnerable)*



**08608 – Trenton, 69.2**  
**08104 – Camden, 71.7**  
**07108 – Newark, 72.8**  
**07112 – Newark, 72.9**  
**08102 – Camden, 73.4**

➤ **Percent uninsured**

Individuals who lack health insurance are limited in their ability to access the healthcare delivery continuum efficiently. Studies have shown that preventive care, early intervention, and access to primary care are critical components of maintaining one's health. While the Affordable Care Act (ACA) made significant inroads toward expanding insurance coverage, many individuals still lack health insurance. CHART's study showed wide variation in the percent of individuals lacking insurance from community to community, ranging from a low of 0.7 percent to a high of 35.6 percent. The median percent uninsured for the 38 zip codes with the poorest health status is 18.7 percent, versus a statewide median of 6.3 percent – or nearly three times greater.

**TOP FIVE ZIP CODES**  
*(Least Vulnerable)*



**07946 – Millington, 0.74%**  
**07677 – Woodcliff Lake, 0.77%**  
**07021 – Essex Fells, 0.97%**  
**07980 – Stirling, 1.06%**  
**07933 – Gillette, 1.11%**

**BOTTOM FIVE ZIP CODES**  
*(Most Vulnerable)*



**07105 – Newark, 35.61%**  
**08611 – Trenton, 28.81%**  
**07650 – Palisades Park, 27.99%**  
**07087 – Union City, 27.71%**  
**07206 – Elizabethport, 26.54%**

## › **Percent Medicaid**

The recent Medicaid expansion included as part of the ACA has significantly reduced the number of uninsured in New Jersey. Unfortunately, New Jersey ranks first in the country in the number of primary care practices that do not accept Medicaid patients. About 70 percent of all U.S. office-based physicians accept new Medicaid patients, including two-thirds of primary care physicians and close to three-quarters (72 percent) of specialists. The percentage of physicians accepting new Medicaid patients varies by state, ranging from 39 percent in New Jersey to 97 percent in Nebraska<sup>26</sup>, leaving these patients to seek services for primary care conditions in the hospital emergency room, the most-costly setting of care. The zip code range for this measure varies significantly from a low of just 0.55 percent of residents in a single zip code covered by Medicaid to a high of 59.4 percent. The median for the 38 zip codes with the poorest health status is 38 percent, versus a statewide median of 10 percent – or 3.7 times greater.

### **TOP FIVE ZIP CODES**

*(Least Vulnerable)*

**07021** – Essex Fells, 0.55%

**07677** – Woodcliff Lake, 1.42%

**07423** – Ho-Ho-Kus, 1.73%

**07704** – Fair Haven, 1.87%

**07922** – Berkeley Heights, 1.87%

### **BOTTOM FIVE ZIP CODES**

*(Most Vulnerable)*

**08104** – Camden, 59.36%

**08102** – Camden, 57.50%

**08103** – Camden, 52.33%

**08701** – Lakewood, 51.11%

**07522** – Paterson, 50.46%

## › **Percent with no high school diploma**

Education is a key component of health status/vulnerability. One's education impacts the ability to secure meaningful employment and generate income which supports basic needs such as housing, food, and clothing. It can also impact an individual's access to employer-based insurance, not to mention the ability to understand and navigate the healthcare system. Many of New Jersey's most vulnerable communities have a large percentage of residents that lack a high school diploma. The range is from a low of 0.4 percent to a high of 42 percent. The median percent with no high school diploma for the 38 zip codes with the poorest health status is 27 percent, versus a statewide median of 7 percent – or 3.9 times greater.

### **TOP FIVE ZIP CODES**

*(Least Vulnerable)*

**07739** – Little Silver, 0.39%

**07750** – Monmouth Beach, 0.66%

**07021** – Essex Fells, 1.01%

**07704** – Fair Haven, 1.87%

**08558** – Skillman, 1.03%

### **BOTTOM FIVE ZIP CODES**

*(Most Vulnerable)*

**08102** – Camden, 42.14%

**08901** – New Brunswick, 38.09%

**08611** – Trenton, 37.99%

**07206** – Elizabethport, 37.06%

**07105** – Newark, 36.56%

# A Deeper Dive

Located in the shadow of Rutgers, the State University of New Jersey, zip code 08901 in New Brunswick has the state's second-highest percentage of residents without a high school diploma, at 38.1 percent. The public schools are part of a Title 1 school district, with 86.5 percent of its students eligible for the federal free or reduced lunch program. About 85 percent of students in the public schools are Hispanic.<sup>27</sup> How influential is education on the health of a community? While challenged by other factors such as median household income and uninsured rate, zip code 08901, with the state's second worst high school graduation rate, ranks 500th among the state's most vulnerable 537 zip codes.

## › Median household income

Socio-economic status can serve as a powerful predictor of health status, and the predictive power of income alone can shed light on an individual's predisposition to disease or lower life expectancy. New Jersey is one of the most affluent states in the nation, yet the variation in median household income from community to community, some abutting one another, is significant. The range in median household income spans a low of just \$20,856 to a high of \$218,667. The median for the 38 zip codes with the poorest health status is \$38,860, versus a statewide median of \$87,209 – or 55 percent lower.

### TOP FIVE ZIP CODES

*(Least Vulnerable)*

07078 – Short Hills, \$218,667

07021 – Essex Fells, \$200,480

08550 – Princeton Junction, \$196,552

07028 – Glen Ridge, \$190,512

07043 – Montclair, \$185,918

### BOTTOM FIVE ZIP CODES

*(Most Vulnerable)*

07505 – Paterson, \$20,856

08102 – Camden, \$21,773

08104 – Camden, \$22,774

08608 – Trenton, \$24,963

07102 – Newark, \$25,518

## › *Percent unemployed*

Job insecurity has a debilitating impact on health status and serves as another strong predictor of health vulnerability. In addition to the aforementioned lack of access to employer-sponsored health insurance and a primary care network, job insecurity or unemployment also creates additional stress that impacts health, including the linkage of poverty and mental illness. Unemployment rates vary widely from community to community in New Jersey, ranging from a low of 1.1 percent to a high of 22.9 percent. The median unemployment rate for the 38 zip codes with the poorest health status is 14.4 percent, versus a statewide median of 5.9 percent – or 2.4 times greater.

### **TOP FIVE ZIP CODES**

*(Least Vulnerable)*



**07014** – Clifton, 1.12%

**07934** – Gladstone, 1.88%

**07033** – Kenilworth, 1.91%

**07626** – Cresskill, 2.13%

**07069** – Watchung, 2.41%

### **BOTTOM FIVE ZIP CODES**

*(Most Vulnerable)*



**07108** – Newark, 22.85%

**08346** – Newtonville, 21.70%

**08350** – Richland, 21.70%

**08310** – Buena, 21.03%

**07103** – Newark, 20.07%

## *A Deeper Dive*

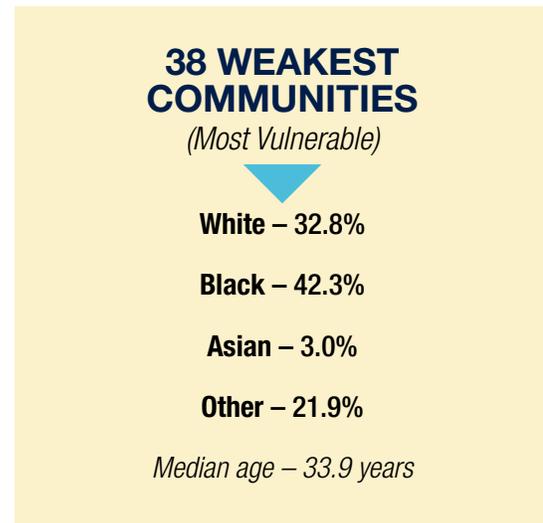
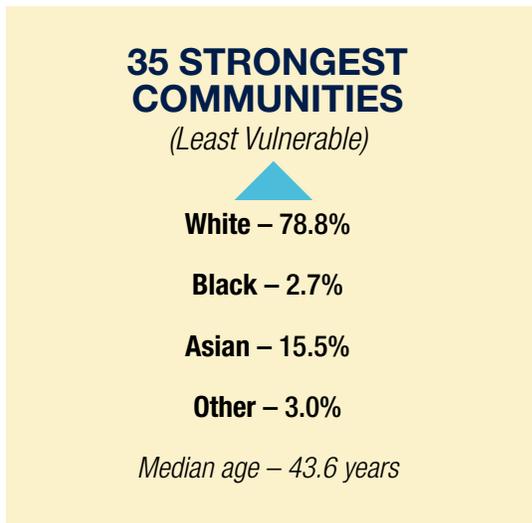
*The farmlands of western Atlantic County are home to three of the top five zip codes with New Jersey's highest unemployment rates: 08346 (Newtonville), 08350 (Richland) – both part of Buena Vista Township – and 08310 (Buena). Tucked between highways 40 and 322, these zip codes are roughly 45 miles from Atlantic City and 50 miles or more to Philadelphia. The bus route from Buena Vista to Philadelphia travels through Atlantic City – making it a three-hour, 45-minute trip. With public transportation extremely limited, residents of Buena Vista Township spend more time in cars riding to work than the national average.<sup>28,29</sup>*



## Demographic characteristics and age/race variation

In addition to profiling New Jersey's 537 zip codes based on the 20 measures selected for this study, CHART also conducted a broad demographic review of communities across the state. New Jersey, like many northeastern states, is a melting pot of young/old, affluent/poor, and a full complement of races and ethnicities.

The median age of New Jersey's population is 41.9 years old, and the racial composition is 68 percent White, 13.4 percent Black, 9.4 percent Asian and 9.1 percent other (American Indian, Islander, multi-racial, other). In addition, nearly 20 percent of residents identify themselves as Hispanic. However, comparing the profiles of the strongest 35 zip codes and the weakest 38 zip codes from a health status/vulnerability perspective reveals significant differences in demographics.



The data show that New Jersey's most vulnerable communities tend to have a population that is younger and predominantly minority than the population of the state as a whole.

Courtesy: Deborah Heart and Lung Center



## A Deeper Dive:

### A Tale of Two Zip Codes in Jersey City

Striking variations that exist in Jersey City illuminate the wide differences in health status, life expectancy and other variables that can exist in communities that are contiguous to each other. CHART examined six standard zip codes with significant populations in Jersey City – 07302, 07304, 07305, 07306, 07307 and 07310. These zip codes have a combined population of more than 263,000, representing more than 99 percent of the Census Bureau’s total estimated 2018 population for the city of 265,549. Jersey City ranks as the second most populous city in New Jersey, trailing only Newark. The city’s land area is approximately 14.8 square miles resulting in a population density of nearly 18,000 people per square mile. This population density is 15 times that of the state of New Jersey, which is the most densely populated state in the United States.

Jersey City Zip Code Map



## A Deeper Dive: A Tale of Two Zip Codes in Jersey City ... continued

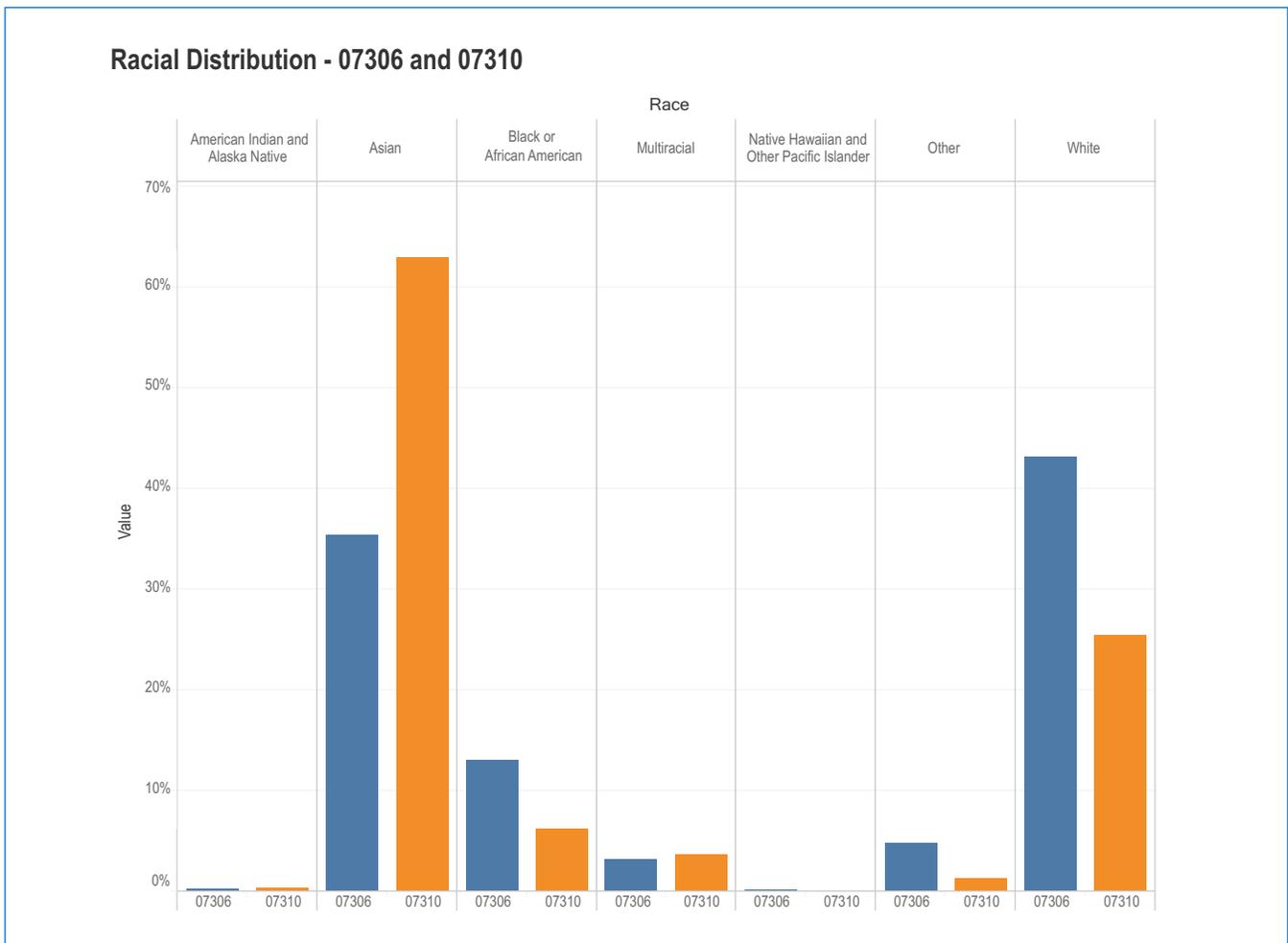
The table below highlights some variances between two adjacent zip codes – 07306 and 07310 – separated by mere blocks in the same city:

Zip Code	CHART Zip Code Rank	Median Household Income	Percent w/o High School Diploma	Percent Unemployed	Percent Uninsured	Percent Medicaid	Percent SNAP Households	ED Visits w/ Chronic Condition per 1,000 Population	ED Visits w/ Mental Health/SUD per 1,000 Population
07306	451	\$51,798	14.9%	7.5%	18.1%	25.3%	19.4%	41.6	76
07310	91	\$148,118	3.5%	5.1%	4.8%	4.7%	3.0%	11.6	29.3

Zip code 07306 ranks in the weakest performing 16 percent of all zip codes, while 07310 ranks in the top 17 percent. Median household income in zip code 07310 is nearly three times greater than that of 07306 (\$148,118 versus \$51,798). Fifteen percent of the population in 07306 lacks a high school diploma, likely influencing their ability to secure stable employment and generate a sustaining income. Zip code 07306 also has nearly 20 percent of its households receiving SNAP benefits and 18 percent of its residents lack health insurance.

These two zip codes share some racial commonality. In both zip codes, the percentage of Asian residents is much higher than the statewide average of 9.4 percent (36 percent in 07306 and 63 percent in 07310).

Jersey City serves as one example of how, within one city's boundaries, there can be considerable variation in the standard of living, health status, and health vulnerability. To redress these imbalances, policymakers and state and local government agencies should explore strategic investments in education, business, and access to needed healthcare services in disadvantaged communities.



## CONCLUSIONS AND RECOMMENDATIONS

Only recently have healthcare providers, insurers, government agencies, and other stakeholders begun to recognize the impact that social determinants can have on health and well-being. Access to healthy food, stable housing, employment, and education – not to mention social interaction – have all been undervalued in relation to their impact on health status. Clinicians should seek to factor these variables into patient evaluations. Doing so will allow for a broader and more comprehensive approach to care delivery.

Investments in social determinants intervention programs can have the real impact of bending the healthcare cost curve. This study has demonstrated a linkage across New Jersey between unfavorable social factors and poor health status/increased health vulnerability. Ignoring this linkage will only serve to forestall society’s ability to broadly improve health status in the most vulnerable communities. If healthcare services are brought to the community, residents are more likely to take advantage of needed services. Examples of outreach programs include mobile asthma vans, mobile outreach vehicles, community-based care, and tutoring vans for underprivileged communities.

While this study has identified New Jersey’s most vulnerable communities, it also can serve as a road map of where strategic investments can lead to significant improvements. An emerging community development sector seeks “to improve the social, physical, and economic conditions in disadvantaged neighborhoods through developing and financing affordable housing, schools, grocery stores, community services such as child care and health clinics, economic and workforce development projects, and other activities that revitalize or stabilize low to moderate income areas.”<sup>10</sup> Expansion of community health worker models focused on mental health, chronic condition management, and first aid options should be explored. Using clinical data with social determinants together provides the ability for clinicians and policymakers to make proactive decisions that will improve population health.

Solutions will not be grounded in a one-size-fits-all approach. They must be customized to the needs of each community. CHART’s zip code-level vulnerable community analysis illuminates that inroads must be made one zip code at a time.

Courtesy: Virtua Health



## Appendix A – Complete Rankings

Zip	City/Town	Rank	Zip	City/Town	Rank	Zip	City/Town	Rank
08103	Camden	537	08861	Perth Amboy	492	07203	Roselle	447
08608	Trenton	536	07734	Keansburg	491	08562	Wrightstown	446
08104	Camden	535	07202	Elizabeth	490	07753	Neptune	445
08102	Camden	534	08066	Paulsboro	489	07002	Bayonne	444
07102	Newark	533	08751	Seaside Heights	488	08406	Ventnor City	443
08401	Atlantic City	532	07502	Paterson	487	07047	North Bergen	442
07505	Paterson	531	07305	Jersey City	486	08244	Somers Point	441
07114	Newark	530	07504	Paterson	485	07065	Rahway	440
08105	Camden	529	08629	Trenton	484	08882	South River	439
07108	Newark	528	07304	Jersey City	483	08340	Millmay	438
07103	Newark	527	08030	Gloucester City	482	08037	Hammonton	437
07501	Paterson	526	08327	Leesburg	481	08832	Keasbey	436
08611	Trenton	525	07740	Long Branch	480	08752	Seaside Park	435
08346	Newtonville	524	08638	Trenton	479	08063	National Park	434
07107	Newark	523	07712	Asbury Park	478	08314	Delmont	433
08609	Trenton	522	08332	Millville	477	08078	Runnemede	432
07522	Paterson	521	08349	Port Norris	476	08733	Lakehurst	431
07112	Newark	520	08759	Manchester Township	475	07008	Carteret	430
08232	Pleasantville	519	08341	Minotola	474	07026	Garfield	429
07104	Newark	518	07022	Fairview	473	08049	Magnolia	428
08618	Trenton	517	07063	Plainfield	472	08205	Absecon	427
07206	Elizabethport	516	08031	Bellmawr	471	07036	Linden	426
07524	Paterson	515	08093	Westville	470	07735	Keyport	425
08069	Penns Grove	514	08757	Toms River	469	07644	Lodi	424
07503	Paterson	513	07801	Dover	468	08330	Mays Landing	423
07201	Elizabeth	512	08312	Clayton	467	08089	Waterford Works	422
07513	Paterson	511	08260	Wildwood	466	07011	Clifton	421
07018	East Orange	510	08242	Rio Grande	465	07601	Hackensack	420
07055	Passaic	509	08215	Egg Harbor City	464	08835	Manville	419
07017	East Orange	508	07093	West New York	463	07088	Vauxhall	418
08045	Lawnside	507	07060	Plainfield	462	07029	Harrison	417
07111	Irvington	506	07208	Elizabeth	461	08096	West Deptford	416
07514	Paterson	505	08310	Buena	460	08109	Merchantville	415
08326	Landisville	504	08350	Richland	459	08029	Glendora	414
07105	Newark	503	08107	Oaklyn	458	07857	Netcong	413
07106	Newark	502	08046	Willingboro	457	08345	Newport	412
08360	Vineland	501	08021	Clementon	456	07032	Kearny	411
08901	New Brunswick	500	08251	Villas	455	07416	Franklin	410
08302	Bridgeton	499	08201	Absecon	454	08091	West Berlin	409
08015	Browns Mills	498	08610	Trenton	453	07650	Palisades Park	408
08079	Salem	497	08865	Phillipsburg	452	07307	Jersey City	407
08110	Pennsauken	496	07306	Jersey City	451	08311	Cedarville	406
07050	Orange	495	08010	Beverly	450	07205	Hillside	405
08068	Pemberton	494	07062	Plainfield	449	08028	Glassboro	404
07087	Union City	493	08701	Lakewood	448	07756	Ocean Grove	403

<b>Zip</b>	<b>City/Town</b>	<b>Rank</b>	<b>Zip</b>	<b>City/Town</b>	<b>Rank</b>	<b>Zip</b>	<b>City/Town</b>	<b>Rank</b>
07720	Bradley Beach	402	08879	South Amboy	357	08014	Bridgeport	312
07606	South Hackensack	401	07631	Englewood	356	08830	Iselin	311
08092	West Creek	400	08518	Florence	355	07403	Bloomington	310
08007	Barrington	399	08721	Bayville	354	08869	Raritan	309
08805	Bound Brook	398	08241	Port Republic	353	08846	Middlesex	308
08087	Tuckerton	397	08753	Toms River	352	07660	Ridgefield Park	307
08270	Woodbine	396	08724	Brick	351	07204	Roselle Park	306
08094	Williamstown	395	08758	Waretown	350	08731	Forked River	305
07074	Moonachie	394	08065	Palmyra	349	07728	Freehold	304
08060	Mount Holly	393	08722	Beachwood	348	07031	North Arlington	303
08234	Egg Harbor Township	392	07803	Mine Hill	347	08088	Vincentown	302
08052	Maple Shade	391	08880	South Bound Brook	346	08734	Lanoka Harbor	301
08019	Chatsworth	390	08075	Riverside	345	08520	Hightstown	300
08210	Cape May Court House	389	08204	Cape May	344	07719	Belmar	299
08016	Burlington	388	07701	Red Bank	343	07847	Kenvil	298
08059	Mount Ephraim	387	07724	Eatontown	342	07442	Pompton Lakes	297
07109	Belleville	386	07057	Wallington	341	08902	North Brunswick	296
08002	Cherry Hill	385	07882	Washington	340	07607	Maywood	295
08083	Somerdale	384	07843	Hopatcong	339	07421	Hewitt	294
07420	Haskell	383	07095	Woodbridge	338	08742	Point Pleasant Beach	293
08723	Brick	382	07603	Bogota	337	07439	Ogdensburg	292
08361	Vineland	381	07407	Elmwood Park	336	08226	Ocean City	291
07885	Wharton	380	08203	Brigantine	335	07457	Riverdale	290
07643	Little Ferry	379	08318	Elmer	334	08225	Northfield	289
08511	Cookstown	378	08050	Manahawkin	333	08090	Wenonah	288
08005	Barnegat	377	08071	Pitman	332	07848	Lafayette	287
08344	Newfield	376	08619	Trenton	331	07077	Sewaren	286
08755	Toms River	375	07003	Bloomfield	330	07840	Hackettstown	285
07721	Cliffwood	374	07072	Carlstadt	329	08106	Audubon	284
07508	Haledon	373	08323	Greenwich	328	08817	Edison	283
08027	Gibbstown	372	07657	Ridgefield	327	07001	Avenel	282
08328	Malaga	371	07732	Highlands	326	07874	Stanhope	281
08322	Franklinville	370	07461	Sussex	325	07083	Union	280
08012	Blackwood	369	07827	Montague	324	07826	Branchville	279
08070	Pennsville	368	07462	Vernon	323	08876	Somerville	278
07010	Cliffside Park	367	08098	Woodstown	322	07506	Hawthorne	277
07823	Belvidere	366	08343	Monroeville	321	08527	Jackson	276
08081	Sicklerville	365	08009	Berlin	320	08048	Lumberton	275
08319	Estell Manor	364	07071	Lyndhurst	319	07034	Lake Hiawatha	274
08317	Dorothy	363	08097	Woodbury Heights	318	08884	Spotswood	273
07860	Newton	362	08859	Parlin	317	07604	Hasbrouck Heights	272
08084	Stratford	361	08872	Sayreville	316	07073	East Rutherford	271
08628	Trenton	360	08043	Voorhees	315	07035	Lincoln Park	270
08004	Atco	359	07863	Oxford	314	07512	Totowa	269
08086	Thorofare	358	08067	Pedricktown	313	07440	Pequannock	268

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07850	Landing	267	07856	Mount Arlington	222	07757	Oceanport	177
07064	Port Reading	266	07727	Farmingdale	221	08816	East Brunswick	176
07094	Secaucus	265	07838	Great Meadows	220	07020	Edgewater	175
08863	Fords	264	07737	Leonardo	219	07832	Columbia	174
07424	Little Falls	263	07652	Paramus	218	08641	Trenton	173
08533	New Egypt	262	07960	Morristown	217	07456	Ringwood	172
07024	Fort Lee	261	07758	Port Monmouth	216	08827	Hampton	171
08831	Monroe Township	260	08505	Bordentown	215	08077	Riverton	170
07005	Boonton	259	07422	Highland Lakes	214	07865	Port Murray	169
08080	Sewell	258	07646	New Milford	213	08054	Mount Laurel	168
07460	Stockholm	257	08738	Mantoloking	212	07866	Rockaway	167
07730	Hazlet	256	08512	Cranbury	211	07702	Shrewsbury	166
08873	Somerset	255	08034	Cherry Hill	210	07027	Garwood	165
07605	Leonia	254	08648	Lawrence Township	209	07033	Kenilworth	164
07080	South Plainfield	253	07716	Atlantic Highlands	208	08829	High Bridge	163
08051	Mantua	252	07302	Jersey City	207	08221	Linwood	162
07086	Weehawken	251	07067	Colonia	206	07418	Glenwood	161
08620	Trenton	250	07828	Budd Lake	205	08036	Hainesport	160
07042	Montclair	249	07666	Teaneck	204	07066	Clark	159
07663	Saddle Brook	248	07030	Hoboken	203	08822	Flemington	158
07621	Bergenfield	247	07822	Augusta	202	08886	Stewartsville	157
08243	Sea Isle City	246	07075	Wood Ridge	201	07656	Park Ridge	156
08837	Edison	245	07480	West Milford	200	08053	Marlton	155
07647	Northvale	244	07821	Andover	199	08826	Glen Gardner	154
07444	Pompton Plains	243	08554	Roeboling	198	08820	Edison	153
08850	Milltown	242	08741	Pine Beach	197	07410	Fair Lawn	152
08857	Old Bridge	241	07070	Rutherford	196	07430	Mahwah	151
07419	Hamburg	240	07764	West Long Branch	195	07834	Denville	150
07630	Emerson	239	08085	Swedesboro	194	07755	Oakhurst	149
07052	West Orange	238	08022	Columbus	193	07004	Fairfield	148
08735	Lavallette	237	07470	Wayne	192	07726	Englishtown	147
07012	Clifton	236	08035	Haddon Heights	191	07717	Avon-by-the-Sea	146
07747	Matawan	235	08223	Marmora	190	07435	Newfoundland	145
07662	Rochelle Park	234	07628	Dumont	189	08736	Manasquan	144
07849	Lake Hopatcong	233	07465	Wanaque	188	08553	Rocky Hill	143
08809	Clinton	232	08402	Margate City	187	07950	Morris Plains	142
07013	Clifton	231	08230	Ocean View	186	07711	Allenhurst	141
07718	Belford	230	07836	Flanders	185	08807	Bridgewater	140
08690	Trenton	229	08854	Piscataway	184	07405	Butler	139
08108	Collingswood	228	07825	Blairstown	183	08514	Cream Ridge	138
07054	Parsippany	227	07936	East Hanover	182	08536	Plainsboro	137
08026	Gibbsboro	226	07110	Nutley	181	08852	Monmouth Junction	136
08812	Dunellen	225	08828	Helmetta	180	07436	Oakland	135
07731	Howell	224	07748	Middletown	179	07014	Clifton	134
08904	Highland Park	223	08008	Beach Haven	178	08530	Lambertville	133

<b>Zip</b>	<b>City/Town</b>	<b>Rank</b>	<b>Zip</b>	<b>City/Town</b>	<b>Rank</b>	<b>Zip</b>	<b>City/Town</b>	<b>Rank</b>
08041	Jobstown	132	07738	Lincroft	87	07039	Livingston	42
07852	Ledgewood	131	08020	Clarksboro	86	08867	Pittstown	41
08887	Three Bridges	130	07079	South Orange	85	08515	Chesterfield	40
07438	Oak Ridge	129	07092	Mountainside	84	08801	Annandale	39
07432	Midland Park	128	07940	Madison	83	07041	Millburn	38
07723	Deal	127	08691	Trenton	82	07670	Tenafly	37
08062	Mullica Hill	126	07746	Marlboro	81	07830	Califon	36
07675	Westwood	125	07632	Englewood Cliffs	80	07974	New Providence	35
08802	Asbury	124	07676	Township Of Washington	79	08889	Whitehouse Station	34
08730	Brielle	123	08057	Moorestown	78	07930	Chester	33
07927	Cedar Knolls	122	07045	Montville	77	08853	Neshanic Station	32
08403	Longport	121	07068	Roseland	76	07023	Fanwood	31
08247	Stone Harbor	120	08202	Avalon	75	07627	Demarest	30
07645	Montvale	119	07921	Bedminster	74	08540	Princeton	29
07762	Spring Lake	118	08824	Kendall Park	73	07059	Warren	28
07040	Maplewood	117	07733	Holmdel	72	07922	Berkeley Heights	27
08055	Medford	116	07069	Watchung	71	07641	Haworth	26
07081	Springfield	115	07924	Bernardsville	70	07046	Mountain Lakes	25
07044	Verona	114	07661	River Edge	69	08836	Martinsville	24
08061	Mount Royal	113	07871	Sparta	68	07450	Ridgewood	23
08848	Milford	112	07640	Harrington Park	67	07417	Franklin Lakes	22
08840	Metuchen	111	07869	Randolph	66	07945	Mendham	21
08823	Franklin Park	110	07932	Florham Park	65	07931	Far Hills	20
07624	Closter	109	08551	Ringoes	64	07028	Glen Ridge	19
07009	Cedar Grove	108	07401	Allendale	63	07934	Gladstone	18
08804	Bloomsbury	107	08559	Stockton	62	07739	Little Silver	17
07876	Succasunna	106	07980	Stirling	61	07920	Basking Ridge	16
08560	Titusville	105	07933	Gillette	60	07677	Woodcliff Lake	15
07463	Waldwick	104	07649	Oradell	59	07452	Glen Rock	14
08825	Frenchtown	103	07901	Summit	58	08558	Skillman	13
08844	Hillsborough	102	08833	Lebanon	57	07722	Colts Neck	12
07058	Pine Brook	101	08810	Dayton	56	07423	Ho-Ho-Kus	11
08501	Allentown	100	07751	Morganville	55	08502	Belle Mead	10
07016	Cranford	99	08534	Pennington	54	07928	Chatham	9
07648	Norwood	98	08510	Millstone Township	53	07704	Fair Haven	8
07981	Whippany	97	07481	Wyckoff	52	07090	Westfield	7
07750	Monmouth Beach	96	07853	Long Valley	51	07021	Essex Fells	6
08535	Millstone Township	95	07082	Towaco	50	08550	Princeton Junction	5
07076	Scotch Plains	94	08525	Hopewell	49	07043	Montclair	4
08056	Mickleton	93	08542	Princeton	48	07946	Millington	3
07006	Caldwell	92	07760	Rumson	47	07976	New Vernon	2
07310	Jersey City	91	07626	Cresskill	46	07078	Short Hills	1
07642	Hillsdale	90	08033	Haddonfield	45			
08750	Sea Girt	89	07458	Saddle River	44			
08003	Cherry Hill	88	07446	Ramsey	43			

## ➤ *Appendix B – Measures*

### 1. Emergency Department (ED) Visits with Chronic Conditions

- **DEFINITION:** ED visits with two or more chronic conditions per 1,000 population. Chronic conditions visits are identified by having an ICD-10 diagnosis code in any position for two or more of the following conditions: Asthma, Chronic Kidney Disease, COPD, Diabetes, Heart Failure, High Cholesterol, Hypertension, or Obesity. Note: mental health and substance abuse disorders are not included in chronic conditions but are measured independently in a separate metric.
- **SOURCE:** 2018 Uniform Billing Hospital Claims Data and United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 8

### 2. Emergency Department (ED) Visits with Mental Health/Substance Abuse

- **DEFINITION:** ED visits with mental health/substance abuse per 1,000 population. Mental health/substance abuse visits are identified by having an ICD-10 diagnosis code in any position in the patient record beginning with "F."
- **SOURCE:** 2018 Uniform Billing Hospital Claims Data and United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 7

### 3. Emergency Department (ED) Frequent Flyers

- **DEFINITION:** ED frequent flyers per 1,000 population. Individual patients who had greater than five visits to one or more hospital ED in 2018.
- **SOURCE:** 2018 Uniform Billing Hospital Claims Data and United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 6

### 4. Low-Acuity Emergency Department (ED) Visits

- **DEFINITION:** Low-Acuity ED Visits per 1,000 Population. Low-Acuity ED visits are cases with minor problems and minimal risk. Many of these cases may have been able to be treated in a doctor's office or other outpatient setting. The patients are identified through the Current Procedural Terminology (CPT) code of 99281 in any position on the patient record.
- **SOURCE:** 2018 Uniform Billing Hospital Claims Data and United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 5

### 5. Low Birthweight Babies

- **DEFINITION:** Low birthweight babies as a percent of total babies born. Total babies with low birthweight. Due to low sample size, five years cumulative data is measured. Low birthweight is defined as less than 2500 grams (5lbs 8oz) at birth.
- **SOURCE:** 2013-2017 New Jersey Vital Statistics Data, Birth Certificates
- Lower values are desirable
- Weight (out of 10): 1

### 6. Teen Births

- **DEFINITION:** Babies born to a teen mother per 1,000 population of female teenagers (aged 15-19 years). Total babies born to a mother aged 15-19 years. Due to low sample size, five years cumulative data is measured. Teen mothers are defined as aged 15-19 to align with the Census Bureau's age breakout of the population.
- **SOURCE:** 2013-2017 New Jersey Vital Statistics Data, Birth Certificates and 2013-2017 United States Census Bureau, American Community Survey 5 year-estimates
- Lower values are desirable
- Weight (out of 10): 1

### 7. No Prenatal Care

- **DEFINITION:** Mothers having no prenatal care as a percent of total babies born. Total mothers self-reporting no prenatal care. Due to low sample size, five years cumulative data is measured. Data on prenatal care is collected at time of admission for birth.
- **SOURCE:** 2013-2017 New Jersey Vital Statistics Data, Birth Certificates
- Lower values are desirable
- Weight (out of 10): 1

### 8. Fetal Deaths

- **DEFINITION:** Fetal deaths as a percent of total babies born. Fetal deaths, as defined by the CDC, are "the spontaneous intrauterine death of a fetus at any time during pregnancy." Due to low sample size, five years cumulative data is measured.
- **SOURCE:** 2011-2015 New Jersey Vital Statistics Data, Fetal Death Database
- Lower values are desirable
- Weight (out of 10): 1

## 9. Premature Deaths

- **DEFINITION:** Number of premature deaths per 1,000 population. A premature death is defined as one occurring before the age of 65.
- **SOURCE:** 2017 New Jersey Vital Statistics Data, Death Certificates, and United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 5

## 10. Life Expectancy

- **DEFINITION:** Life expectancy provides an average number of years a person is expected to live at birth by census tract.
- **SOURCE:** Centers for Disease Control and Prevention, National Center of Health Statistics, USALEEP, 2010-2015 data.
- Higher values are desirable
- Weight (out of 10): 5

## 11. SNAP Benefits

- **DEFINITION:** Percent of households receiving Supplemental Nutrition Assistance Program (SNAP) benefits. SNAP is the largest federal nutrition program, providing benefits to low income individuals and families.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 4

## 12. Food Deserts

- **DEFINITION:** Percent of households living in a food desert. A food desert is defined as a census tract where at least one of the following is true: at least 100 households are located more than 0.5 mile from the nearest supermarket and have no vehicle access; or at least 500 people or 33 percent of the population live more than 20 miles from the nearest supermarket, regardless of vehicle availability.
- **SOURCE:** United States Department of Agriculture, Food Access Research Atlas, 2015
- Lower values are desirable
- Weight (out of 10): 5

## 13. Supportive Housing

- **DEFINITION:** Residents in supportive housing per 1,000 population. Residents in supportive housing are identified as residents receiving rental assistance under programs from the U.S. Department of Housing and Urban Development (HUD). HUD assistance can be in one of the following categories – public housing, tenant-based and privately owned, project-based.
- **SOURCE:** U.S. Department of Housing and Urban Development, Picture of Subsidized Households, 2018, and United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 2

## 14. Limited English-Speaking Households

- **DEFINITION:** Percent of households reporting limited English-speaking within the home.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable
- Weight (out of 10): 6

## 15. Uninsured

- **DEFINITION:** Percent uninsured is the number of civilian noninstitutional population in a zip code without health insurance as a percent of the zip code's total civilian noninstitutional population. The civilian noninstitutional population refers to people 16 years of age and older residing in the 50 States and the District of Columbia who are not inmates of institutions (penal, mental facilities, homes for the aged), and who are not on active duty in the Armed Forces.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable.
- Weight (out of 10): 8

## 16. Percent Medicaid

- **DEFINITION:** Percent Medicaid is the number of civilian noninstitutional population in a zip code with Medicaid as their health insurance as a percent of the zip code's total civilian noninstitutional population. The civilian noninstitutional population refers to people 16 years of age and older residing in the 50 States and the District of Columbia who are not inmates of institutions (penal, mental facilities, homes for the aged), and who are not on active duty in the Armed Forces.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable.
- Weight (out of 10): 5

## 17. No High School Diploma

- **DEFINITION:** Percent with No High School Diploma is the number of people in a zip code 25 years and older with less than a 12th grade education level and no high school diploma as a percent of the zip code's total population 25 years and older.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable.
- Weight (out of 10): 6

## 18. Median Household Income

- **DEFINITION:** Median household income is the median value of the average income of all people living in a housing unit by zip code. Median value indicates half of the households within the zip code have a lower household income and half have a higher household income.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Higher values are desirable.
- Weight (out of 10): 7

## 19. Unemployment

- **DEFINITION:** Percent unemployed is the number of people in a zip code 16 years and older who are unemployed as a percent of the zip code's total population 16 years and older. Unemployed is defined as those who are not working, actively looking for work and available to work. The unemployed also includes those waiting to be called back for a job they were temporarily laid off from.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable.
- Weight (out of 10): 8

## 20. Disability

- **DEFINITION:** Percent disabled is the number of civilian noninstitutional population in a zip code which are disabled as a percent of the zip code's total civilian noninstitutional population. The civilian noninstitutional population refers to people 16 years of age and older residing in the 50 States and the District of Columbia who are not inmates of institutions (penal, mental facilities, homes for the aged), and who are not on active duty in the Armed Forces. Types of disabilities include hearing, vision, cognitive, ambulatory, self-care and independent living.
- **SOURCE:** United States Census Bureau, American Community Survey 2017, 5-Year Estimates
- Lower values are desirable.
- Weight (out of 10): 2

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## > Footnotes

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