NYU
Furman
Center

Advancing research and debate
on housing, neighborhoods,
and urban policy

School of Law
Wagner School of Public Service
New York University

State of
New York City's
Housing and
Neighborhoods

2017 Focus:

Changes in New York City's Housing Stock

LEAD SPONSORS
Citi Community Development
JPMorgan Chase & Co.

SUSTAINING SPONSORS
Bank of America
Santander Bank

SUPPORTING SPONSORS
Artimus
BNY Mellon
The Community Preservation Corporation
Douglaston Development
Dunn Development Corp.
The Durst Organization
Federal Home Loan Bank of New York
Kramer Levin Naftalis & Frankel LLP
Lalezarian Properties
M&T Bank
MUFG Union Bank, N.A.
Muss Development LLC
New York State Association for Affordable Housing
Nixon Peabody LLP
Omni New York LLC
Park Tower Group
Phipps Houses
Real Estate Board of New York
Related Companies
Two Trees Management
Valley National Bank
Wells Fargo

CONTRIBUTING SPONSORS
Ariel Property Advisors
The Arker Companies
AvalonBay Communities, Inc.
B&B Urban
BFC Partners
The Community Development Trust
Dime Community Bank
Forsyth Street Advisors
Jonathan Rose Companies
Lemle & Wolff Companies
LISC NYC
McCormack Baron Salazar
MDG Design + Construction
Mizuho Bank
Monadnock Development
Morgan Stanley
Peter Fass
Seiden & Schein, P.C.
Signature Bank
SKA Marin
TF Cornerstone

AUTHORS
Vicki Been
Stephanie Rosoff
Jessica Yager

The State of New York City's Housing and Neighborhoods report, published annually by the NYU Furman Center, provides a compendium of data and analysis about New York City's housing, land use, demographics, and quality of life for each borough and the city's 59 community districts. This year's full report—including citywide analysis and city, borough, and community district data—is available at furmancenter.org.

State of New York City's Housing & Neighborhoods in 2017

Changes in New York City's Housing Stock

The number of housing units in New York City grew by 19 percent between 1970 and 2016. Despite that growth, prices and rents have risen dramatically, and there are a variety of other signs that the housing supply is not meeting the city's needs.

In Part I of this Focus, we examine the supply of housing in the city, exploring what it looks like today, how it has changed over time, and what has been produced, where, in recent years. In Part II, we explore various indicators of demand: population growth; changes in household composition and size; and increases in the number of jobs. We also examine signs that increases in supply are not moderating the pressures on rents and prices from demand: the vacancy rate, changes in household size and overcrowding, and affordability, including the affordability of units built recently.

Key Findings:

- In 2016, there were about 3,464,000 housing units in New York City. 426,540 of those units (more than 12% of all the units in the city) were in public housing or in privately owned buildings receiving a federal subsidy or participating in New York's Mitchell-Lama program.
- Only about eight percent of the housing stock was built since 2000, and only a bit more than one-third (35.6%) was built since 1960.
- Today, housing units in the city are pretty evenly divided among commonly used categories of building sizes (single-family homes, two- to four-unit buildings, five- to nine-unit buildings, 10- to 49-unit buildings, and buildings of more than 50 units). There is significant variation by borough, however—over 60 percent of units in Staten Island, but less than two percent in Manhattan, were in single-family homes. In 2016, there were over a half million single-family homes in the city (accounting for about 16% of the city's housing units). Close to 1.1 million units (almost one-third of all the units in the city) were in buildings with more than 50 units.
- One-bedroom units and studios made up the largest share of units in the city in 2016, followed by two-bedroom units, then units with three or more bedrooms. Since 1980, the share of housing units built as studios and one-bedroom units has been increasing, with almost 50 percent of the stock built since 2010 falling in those categories.
- The largest number of new units built since 2000 was in the Chelsea/Clinton/Midtown area of Manhattan—double the number of units compared to the next neighborhood on the list (Williamsburg/Greenpoint).
- The neighborhoods with the highest number of units authorized for new construction by building permits issued between 2015 and 2017 are the same neighborhoods where the most new units were built between 2000 and 2016: Brooklyn Heights/Fort Greene, Sunnyside/Woodside, Chelsea/Clinton/Midtown, and Williamsburg/Greenpoint.
- In 2016, NYC had 8.2 percent more housing units, 11 percent more adults, and 16.5 percent more jobs than it did in 2000.
- Median monthly rents have risen in real dollars by about $300 since 2000, at the same time that the median income of a renter household has only increased by $145 per month.
- Newly built units are increasingly more expensive than older units. In 2000, the median unit built in the prior ten years rented for $50/month more than the median for all other units in the city. In 2016, that gap had widened to $400/month (in constant 2017 dollars).

I. Describing the City's Housing Stock

a. Number of Housing Units

In 2016, there were about 3,464,000 housing units in New York City, up 18.7 percent since 1970 (see Table 1). Most of the growth in the city's housing stock has occurred since 1990; nearly half of the 547,000 net additions to the stock since 1970 were added between 2000 and 2016.

While there were more units in every borough in 2016 than there were in 1970, the city's boroughs did not all follow the same growth trends over this time. Between 1970 and 1990, the Bronx and Brooklyn both experienced a decrease in the number of housing units (through demolitions or conversions), while Manhattan and Queens saw modest increases. From 1990 onward, the rate of growth became positive for all boroughs. But, as Table 1 shows, Staten Island experienced a very different trajectory from the other boroughs: between 1970 and 2016, the number of housing units in Staten Island doubled, with most of the growth occurring between 1970 and 2000. Even so, Staten Island had and continues to have the smallest housing stock of the five boroughs, by far: in 2016, Staten Island was home to only five percent of the city's housing units (up from 3% in 1970).

Table 1: Number and Percent Change in Housing Units

	New York City	*Bronx*	*Brooklyn*	*Manhattan*	*Queens*	*Staten Island*
Total Housing Units						
1970	2,917,428	508,596	902,195	714,325	703,058	89,254
1980	2,941,850	450,957	880,958	754,414	736,720	118,801
1990	2,992,212	440,955	873,671	785,127	752,733	139,726
2000	3,200,912	490,659	930,866	798,144	817,250	163,993
2010	3,371,062	511,896	1,000,293	847,090	835,127	176,656
2016	3,463,870	525,788	1,031,125	875,990	851,576	179,391
Percent Change						
1970 to 1980	0.8%	-11.3%	-2.4%	5.6%	4.8%	33.1%
1980 to 1990	1.7%	-2.2%	-0.8%	4.1%	2.2%	17.6%
1990 to 2000	7.0%	11.3%	6.5%	1.7%	8.6%	17.4%
2000 to 2010	5.3%	4.3%	7.5%	6.1%	2.2%	7.7%
2010 to 2016	2.8%	2.7%	3.1%	3.4%	2.0%	1.5%
1970 to 2016	18.7%	3.4%	14.3%	22.6%	21.1%	101.0%

Sources: Neighborhood Change Database, American Community Survey, NYU Furman Center

Note: Change in the housing stock reflects the net change between time periods as housing units are added through conversions or new construction and units are lost through demolition or the combination of multiple units into a single unit

b. Occupancy and Tenure

New York City's housing stock in 2016 included nearly a million owner-occupied units and over two million renter-occupied units (see Table 2). The remaining 349,000 units in the city were classified as vacant. About 79,000 of these vacant units were available for rent (3.6% of the city's rental stock[1]). Nearly 22,000 vacant units were available for sale.[2] But the large majority of the city's vacant units in 2016 (about 248,000 of them) were unavailable for rent or for sale because, for example, they were: held for occasional or seasonal use; purchased or rented but not yet occupied; under construction and far enough along to be weather-tight, but not yet on the market; undergoing renovation; in legal proceedings such as foreclosure or probate; or held off the market for personal or other reasons (e.g., the owner's illness). The categories are somewhat hard to distinguish and measuring vacancy is challenging.[3]

Table 2: Housing Units by Tenure and Occupancy in 2016, New York City

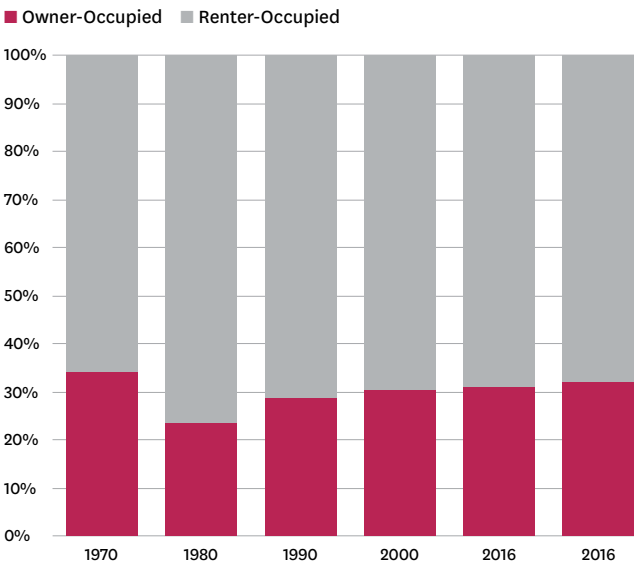
	Total Units	*Share of NYC*
Occupied Units		
Owner-Occupied	998,198	28.8%
Renter-Occupied	2,116,613	61.1%
Available Vacant Units		
Vacant and for rent	79,270	2.3%
Vacant and for sale	21,785	0.6%
Unavailable Vacant Units		
Seasonally vacant	81,030	2.3%
Owned or leased and vacant	40,414	1.2%
Other vacant	126,560	3.7%
Total Units	3,463,870	100.0%

Sources: American Community Survey, NYU Furman Center

The rental vacancy rate—vacant units available for rent as a share of the rental stock—is the statistic that receives the most popular attention (in part because of its relevance as the trigger for the city's rent stabilization laws). The rental vacancy rate has remained below five percent since at least 1970.[4] The most recent New York City Housing and Vacancy Survey (HVS), which is the official source for the purposes of the rent stabilization laws, reports a rental vacancy rate of 3.63 percent in 2017.[5]

In New York City, most people rent their homes. As Figure 1 shows, the share of households that rented their homes increased between 1970 and 1980 by ten percentage points, but has fallen since then, and is now almost back to its 1970 level (66% in 1970; 68% in 2016).[6] The share of households that rented in the city in 2016 (68%) was far higher than in other cities: in the 50 largest cities across the country, only 51.4 percent of the households were renting in 2016.

Figure 1: Share of Occupied Housing Units by Tenure, New York City



Sources: Neighborhood Change Database, American Community Survey, NYU Furman Center

1 The rental vacancy rate is calculated as the share of units that were vacant and for rent as a percent of all rental properties. Table 2 shows vacant for-rent units as a share of all housing units.

2 Vacant units for sale do not represent the full universe of units on the market—a unit can be for sale while occupied.

3 To be consistent with the other data we report, Table 2 uses data from the American Community Survey. New York City's Housing and Vacancy Survey (HVS) for 2017 provides further information on the number and share of unavailable vacant units, and on the various categories that explain their status. New York City Department of Housing and Preservation (2017), retrieved from: http://www1.nyc.gov/assets/hpd/downloads/pdf/about/2017-hvs-initial-findings.pdf.

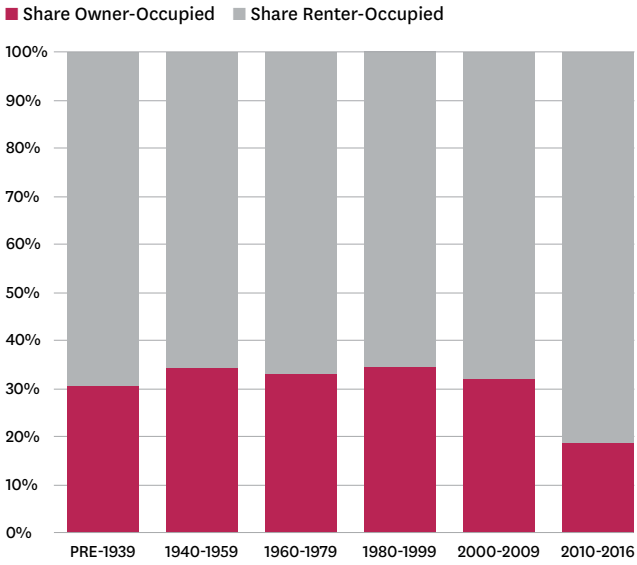
4 Based on the decennial census, the rental vacancy rate was 2.4 percent in 1970; 3.3 percent in 1980; 4.2 percent in 1990; 3.5 percent in 2000; and 4.5 percent in 2010. The American Community Survey (ACS) reports a rental vacancy rate of 4.3 percent (+/-0.2%) in 2010 and 3.6 percent (+/-0.3%) in 2016. Though each of the three measures (decennial census, ACS, and HVS) are valid, vacancy rates from each cannot be compared to either of the others. See the Methods section for more information.

5 See Methods section for more information on the HVS.

6 In Figure 1, the share of owner-occupied housing units and renter-occupied housing units, respectively, are as a share of all occupied-housing units. The tenure breakout in Table 2 reflects owner-occupied and renter-occupied units as a share of all housing units (both occupied and vacant).

Looking at tenure in 2016 by the age of buildings, there is notable variation. Figure 2 shows that, while units of all ages had renter-occupancy rates above 65 percent, the units built most recently in the city were over 80 percent renter-occupied in 2016.[7]

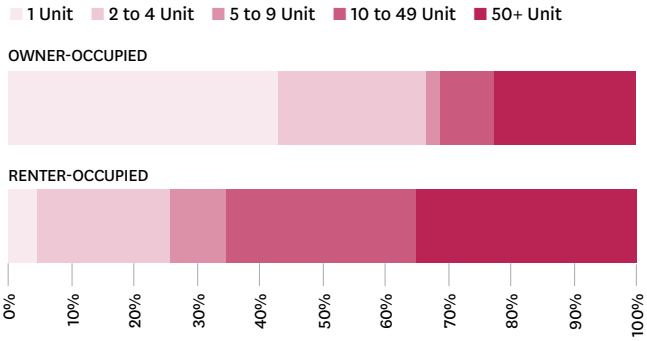
Figure 2: Tenure Status of Occupied Housing Units in 2016 by Year Built, New Yok City



Sources: American Community Survey, NYU Furman Center

Citywide in 2016, most households who owned their own homes lived in buildings with one to four units, but 22.6 percent lived in condominium or cooperative buildings with 50 or more units (see Figure 3). Most renter households in New York City lived in buildings with 10 or more units, but over a quarter of renters—about 546,000 households—lived in smaller buildings with one to four units.

Figure 3: Tenure by Building Size in 2016, New York City

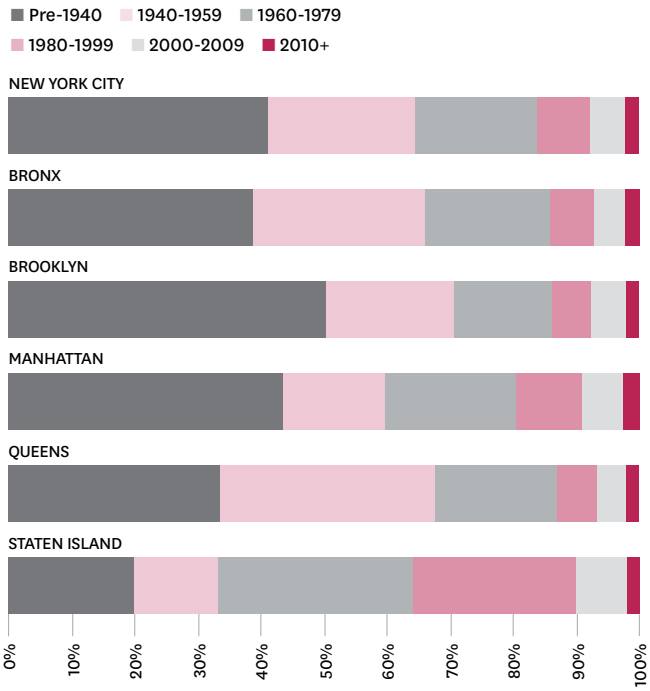


Sources: American Community Survey, NYU Furman Center

c. Housing by Age

Most of the housing in the city was built more than 50 years ago. Forty-one percent of the housing units in the city in 2016 were built before 1940; just over 64 percent were built before 1960; and just under eight percent were built since 2000. There is some variation in the age of the housing stock across the boroughs (shown in Figure 4), but Staten Island is the only borough where the majority of housing units were built after 1960.

Figure 4: Housing Units in 2016 by Year Built



Sources: American Community Survey, NYU Furman Center

7 Building age is self-reported by respondents to the American Community Survey and may not be totally accurate because of tenants' limited knowledge of the year their housing unit was built. We do, however, find a similar result using administrative data. In our *State of New York City's Housing and Neighborhoods in 2016* report, we found that about 71 percent of new units receiving a certificate of occupancy between 2010 and 2016 were in rental buildings with five or more units (Figure 2 includes all renter-occupied units, not just 5+ unit rental buildings).

d. Housing by Building Size

Table 3 shows the distribution of housing units in the city by the size of the building. In 2016, the largest buildings (those with more than 50 units) were home to the largest share of units (31.7% of all units), followed by two- to nine-unit buildings (29.4% of all units), then by 10- to 49-unit buildings (22.6% of all units). Even though New York City is best known for its large buildings, over half a million units (16.0% of all units) in the city were in one-unit buildings (single-family homes).

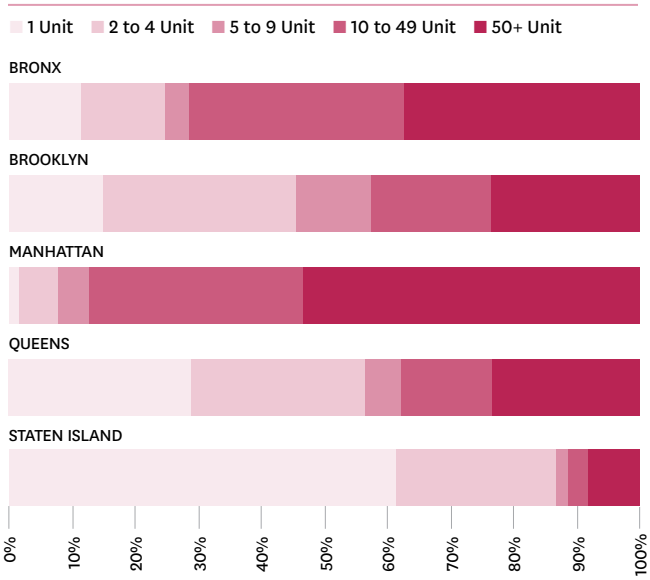
Table 3: Housing Units in 2016 by Building Size, New York City

Building Type	*Number of Units*	*Share of Total Units*
1-Unit	555,910	16.0%
2 to 9 Unit	1,018,718	29.4%
10 to 49 Unit	783,925	22.6%
50+ Unit	1,099,128	31.7%
Other (e.g. mobile home, boat, RV)	6,189	0.2%
Total	3,463,870	100.0%

Sources: American Community Survey, NYU Furman Center

There is a great deal of variation, however, in residential building size across the city's boroughs (see Figure 5). In 2016, there were many more housing units in buildings with 50 or more units in the Bronx and Manhattan than in Brooklyn, Queens, and Staten Island. In Queens, units were distributed more evenly between big and small buildings; and in Staten Island, one-unit buildings were predominant (making up 61.3% of the stock).

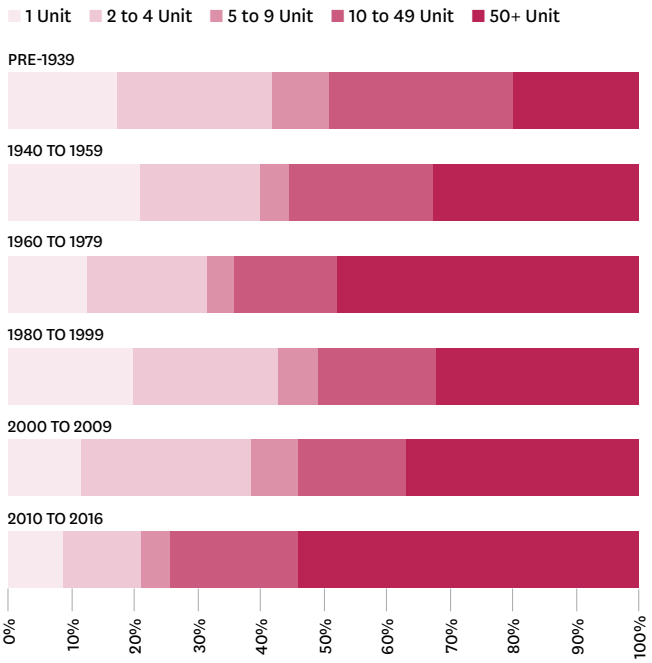
Figure 5: Distribution of Housing Units in 2016 by Building Size



Sources: American Community Survey, NYU Furman Center

There also is considerable variation in the building size across the years in which the housing was built, as Figure 6 shows. Even in the most recent periods, a significant number of single-family buildings were built in the city.

Figure 6: Housing Units in 2016 by Building Size and Year Built, New York City



Sources: IPUMS-USA, NYU Furman Center

e. Housing by Unit Size

One-bedroom units and studios made up the largest share of units in the city in 2016, followed by two-bedroom units, then units with three or more bedrooms.[8] In 2016, as Table 4 shows, 38.4 percent of housing units citywide were studios or one-bedroom units (1.33 million units). Two-bedroom units made up 32 percent of New York City's housing stock in 2016 (1.11 million units); and 29.6 percent of the city's housing units had three or more bedrooms (1.03 million units).

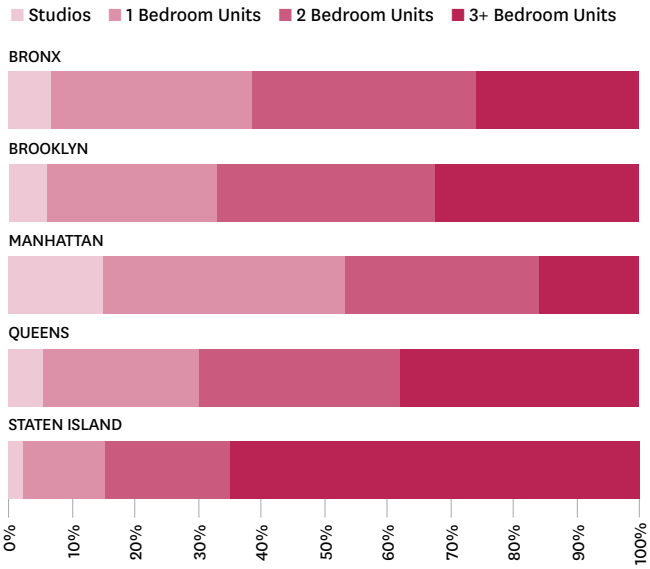
As with building size, there is variation across the boroughs in the distribution of units of different sizes (see Figure 7). Again, Manhattan and Staten Island are at the two opposite ends of the spectrum. In 2016 in Manhattan, studios and one-bedrooms made up 53 percent of the stock, and units with three or more bedrooms made up only 16 percent of the stock. In Staten Island, units with three or more bedrooms made up 65 percent of the stock and studios/one-bedrooms made up only 15 percent of the stock.

Table 4: Housing Units in 2016 by Number of Bedrooms, New York City

Bedroom Type	*Number of Units*	*Share of All Units*
Studio	293,490	8.50%
1 bedroom	1,035,616	29.90%
2 bedrooms	1,109,414	32.00%
3+ bedrooms	1,025,350	29.60%
Total Units	3,463,870	100.00%

Sources: American Community Survey, NYU Furman Center

Figure 7: Distribution of Housing Units in 2016 by Bedroom Size

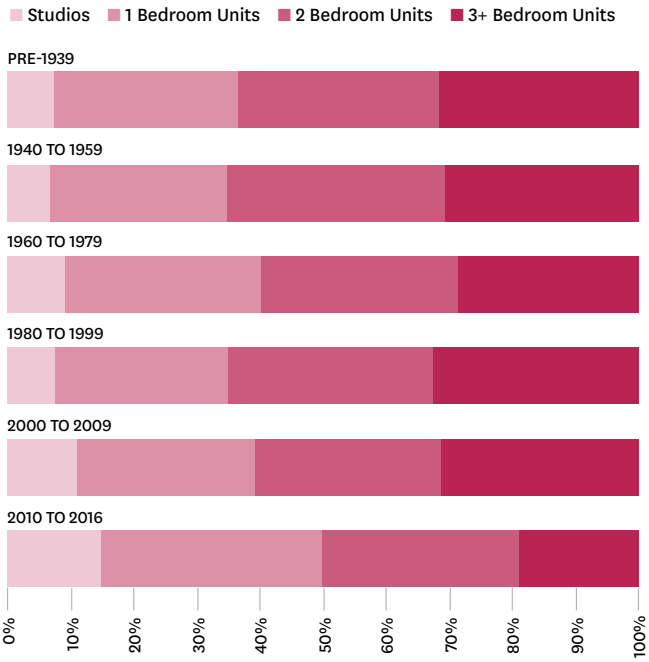


Sources: American Community Survey, NYU Furman Center

8 The composition of New York City's housing stock by number of bedrooms is much different than the composition of the housing stock nationwide. In 2016, 13.5 percent of the nation's housing units were studios or one-bedroom units, about 26 percent were 2-bedroom units, and over 60 percent of housing units had three or more bedrooms.

In every decade since 1980, the share of housing units built as studios and one-bedroom units has increased.[9] Of the housing units existing in 2016 that were built before 1960, as Figure 8 shows, just over a third were studios and one-bedroom units. Of the units in 2016 that were built after 2010, half were studios and one-bedrooms.

Figure 8: Distribution of Housing Units in 2016 by Year Built and Bedroom Size, New York City



Data Sources: IPUMS-USA, NYU Furman Center

f. Housing by Subsidy Status

In 2016, nearly 427,000 housing units in the city were in a property receiving a federal subsidy (including public housing) or participating in New York's Mitchell-Lama program (see Table 5). Those units make up 12 percent of the city's stock, but most are rentals, so the better comparison is that they make up 18.1 percent of the city's rental stock. Of the city's subsidized housing units, the largest share was located in Manhattan (33.9%), followed by the Bronx (28.8%), and Brooklyn (26.7%). By contrast, less than 11 percent of the city's subsidized housing stock was in Queens or Staten Island.

Table 5: Subsidized Housing Units in 2016, New York City

Bedroom Type	*Number Subsidized Units in 2016*	*Share of New York City's Subsidized Units in 2016*
Bronx	122,691	28.8%
Brooklyn	114,080	26.7%
Manhattan	144,628	33.9%
Queens	36,100	8.5%
Staten Island	9,041	2.1%
New York City	426,540	100.0%

Sources: American Community Survey, NYU Furman Center

9 Due to methodology differences between the 1970 decennial census and the American Community Survey (ACS), we cannot compare the composition of the housing stock by bedroom size over time. Instead, we use the ACS Public Use Microdata Sample to present a snapshot of the housing stock in 2016 by year built and bedroom size. Again, however, the year built data is subject to error because respondents to the ACS may not know the exact year a building was built.

g. Recently Built Housing

Brooklyn and Manhattan saw about the same number of housing units—more than 22,000—built between 2010 and 2016, and Queens added almost 19,000 during that period (Table 6). The share of each borough's housing units that were built between 2000 and 2016 is relatively close for the Bronx (7.2%), Brooklyn (7.8%) and Queens (6.7%); Manhattan and Staten Island outpaced the other boroughs with 9.1 percent and 10 percent of their housing stock built between 2000 and 2016.

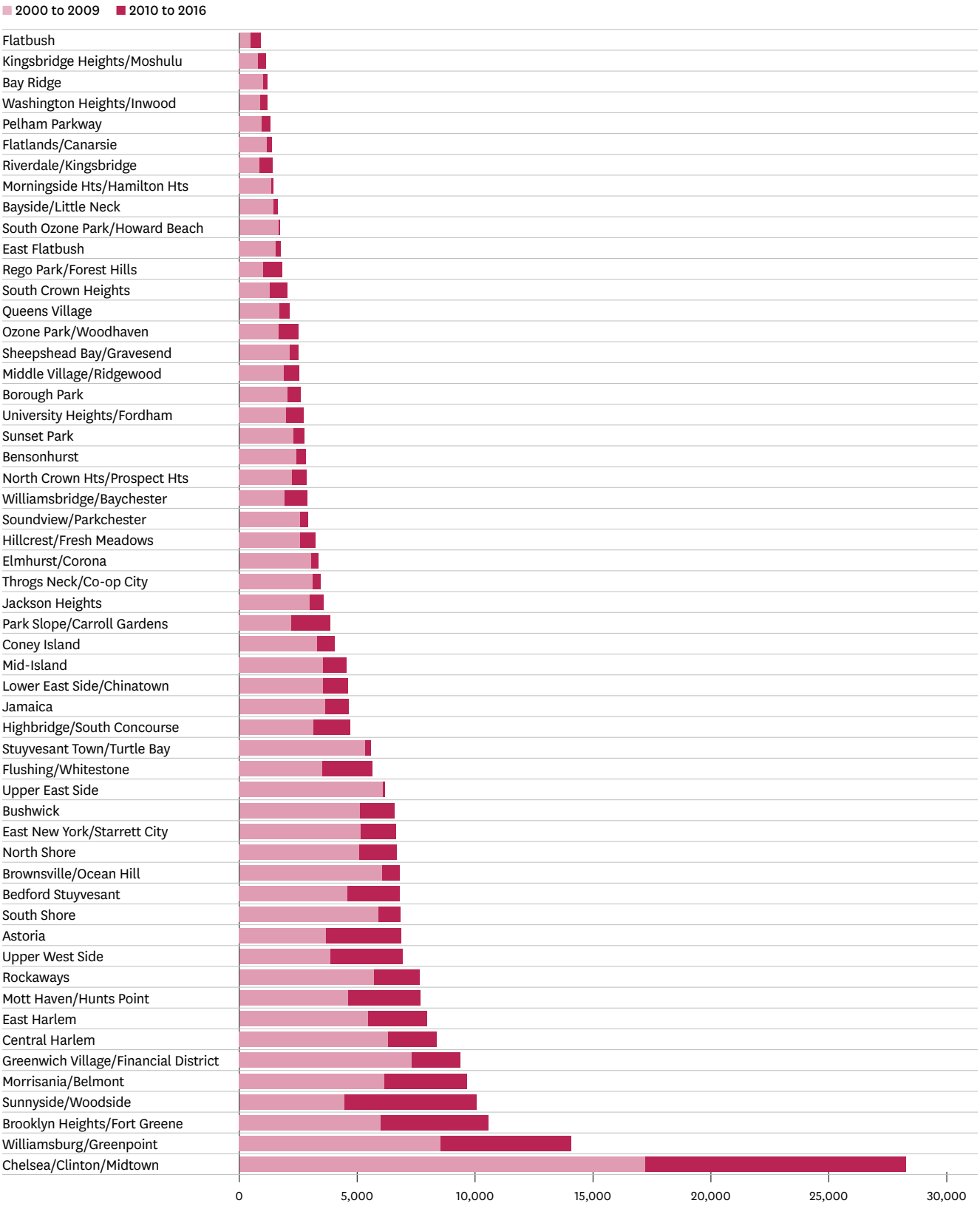
Table 6: Recently Built Housing Units in 2016

	Housing Units in 2016				Share of Housing Units in 2016		
	Total Housing Units	*Built in the 2000s*	*Built between 2010 and 2016*	*Built between 2000 and 2016*	*Built in the 2000s*	*Built between 2010 and 2016*	*Built between 2000 and 2016*
New York City	3,463,870	194,319	78,941	273,260	5.6%	2.3%	7.9%
Bronx	525,788	26,052	11,811	37,863	5.0%	2.2%	7.2%
Brooklyn	1,031,125	57,487	22,655	80,142	5.6%	2.2%	7.8%
Manhattan	875,990	57,321	22,565	79,886	6.5%	2.6%	9.1%
Queens	851,576	38,920	18,440	57,360	4.6%	2.2%	6.7%
Staten Island	179,391	14,539	3,470	18,009	8.1%	1.9%	10.0%

Sources: American Community Survey, NYU Furman Center

There is a great deal of variation in the amount of new construction among neighborhoods. Clinton/Chelsea/Midtown in Manhattan had the largest number of new housing units built between 2000 and 2016 (a total of about 28,000 units); and Flatbush in Brooklyn had the fewest (about 900 units). Figure 9 shows the totals for each of the city's neighborhoods, and is color-coded to show the time period in which the units were built (2000 to 2009 or 2010 to 2016).

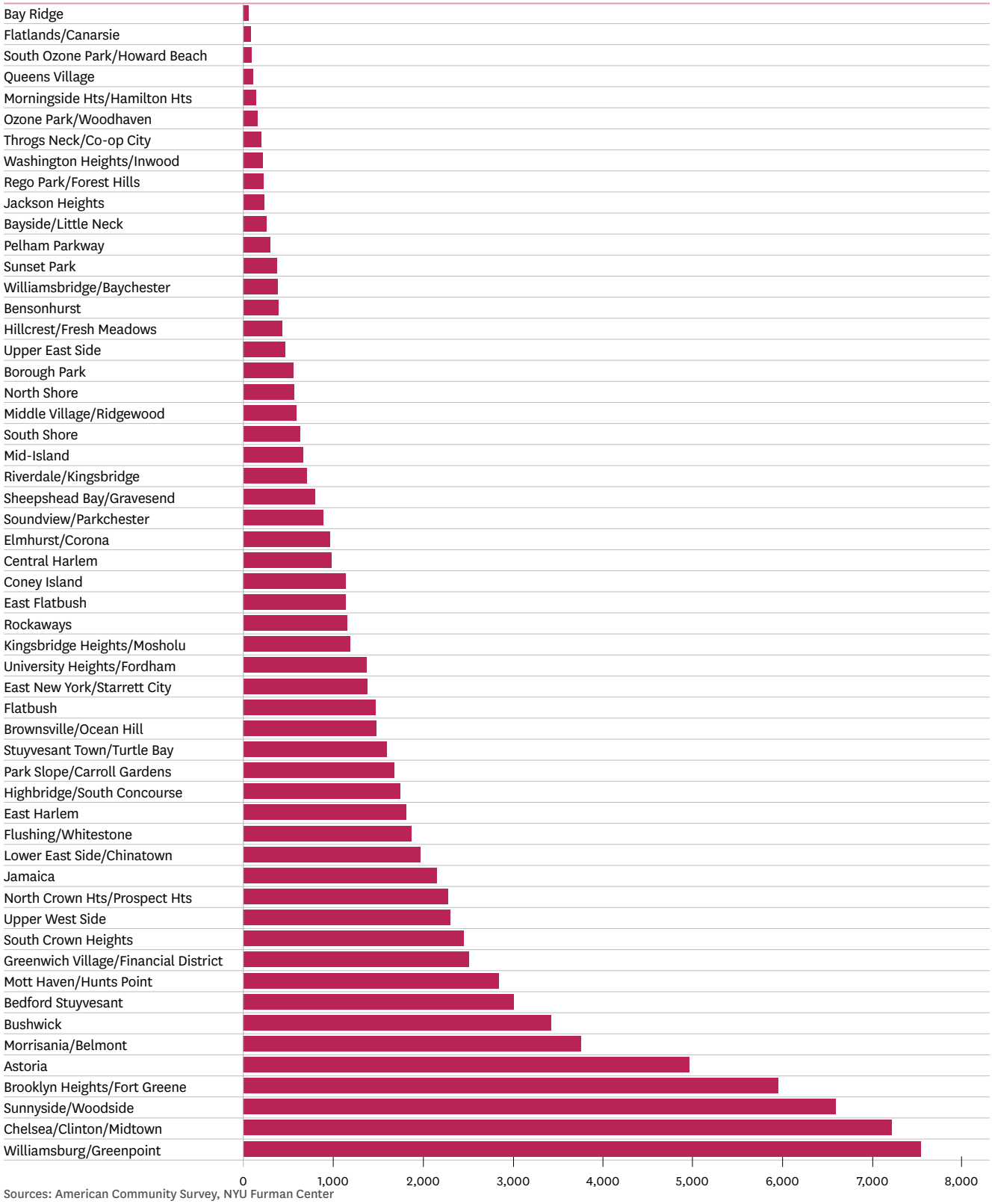
Figure 9: Housing Units in 2016 Built Between 2000 and 2016 by Sub-Borough Area



Sources: American Community Survey, NYU Furman Center

Recently issued building permits provide insight into where new units soon will be coming on line (though not all permits result in built units). Figure 10 shows the total number of building permits issued between 2015 and 2017 by neighborhood. The neighborhoods with the most units authorized for new construction—Brooklyn Heights/Fort Greene, Sunnyside/Woodside, Chelsea/Clinton/Midtown, and Williamsburg/Greenpoint—were also the same neighborhoods with the most units built between 2000 and 2016, shown in Figure 9.

Figure 10: Total Residential Units Authorized by New Building Permits in 2015 through 2017 by Sub-Borough Area



Sources: American Community Survey, NYU Furman Center

Note: While it is possible that units permitted in 2015 (or perhaps even in early 2016), could be completed by the time of the American Community Survey in 2016, that is unlikely. Thus, there should be little overlap between the units shown in Figure 9 and those shown in Figure 10.

II. Changes in the Housing Stock and the Demand for Housing

Any discussion of the changing housing stock in New York City is likely to lead to a question about whether the stock is growing sufficiently to meet the demand for housing and improve the affordability of the city's housing. Identifying the ideal number of housing units that the city should allow (or even encourage) to be constructed ultimately is a philosophical question and requires much more than an analysis of data. To even begin to answer the question requires agreement on such social justice issues as whether we should consider only the people who live here now, or have an obligation (or an explicit goal) to house others from around the world and the nation who want to live here. It raises fundamental issues about how job and population growth is related to the city's ability to pay for improvements to infrastructure, schools, and other essential services, and to provide a social safety net. It also implicates such equity and efficiency concerns as how population and job growth should be distributed across the city, and how much of the growth any one neighborhood should absorb.

Nevertheless, data on housing supply can help inform the debate about whether we need more housing. Here we examine how changes in the city's housing stock compare to possible drivers of housing demand in the city, such as population growth, changes in the composition of the population, and job growth. We also assess the vacancy rate and changes in housing affordability, which are indicators of whether the housing market is able to hold prices constant when demand increases. The changes in factors that drive demand, as well as the measures of the responsiveness of supply, all suggest that New York City needs more housing (especially lower-cost housing) to take the pressure off rents resulting from population changes and job growth.

a. Factors that Affect the Demand for Housing

While people can be more or less crowded in housing units depending on how many units are available, a city where housing growth doesn't keep up with population growth may see housing costs rise and therefore face an affordability challenge. That will depend upon such factors as: how much supply the city had at the start of the period studied; whether and how the composition of the city's population and its households (and their preferences) are changing; how any increases in housing costs compare to increases in incomes; and how other aspects of the city residents' budgets (such as taxes or transportation expenses) are changing. But all other things being equal, if the number of people residing in or seeking to move to the city grows at a faster rate than housing supply, housing costs are likely to increase.[10]

It also is important to compare growth in the housing stock to employment growth. If the economy is producing more jobs, unless those new jobs all are filled by current residents of the city who are not employed, additional housing must be made available and affordable to the households of new workers, either in the city or in the surrounding region. If the city's housing production does not keep up with job growth, both new and existing workers either may have to pay increasing housing costs within the city or commute from outside the city (and other jurisdictions in the region may therefore need to provide housing for those commuters).

In 2016, New York City had about 260,000 more housing units than it did in 2000, representing growth of about 8 percent (see Table 7). Meanwhile, the city's population grew by only 6.6 percent.[11] But growth in population alone fails to capture the changing mix of those who live in the city, which can have significant implications for the housing market. While population grew 6.6 percent, the adult population in the city grew by 11 percent. Adult-only households also made up a larger share of all New York City households in 2016 (70.9%) than in 2000 (66%). The growth in the number of adults is a better measure of the need for housing

10 Not all of the city's housing units are used to house residents, of course. Some are held by non-residents for a variety of uses, such as places to stay during the work week for people whose primary residence is elsewhere or for seasonal or sporadic use (see discussion of units counted as vacant that are unavailable for sale or rent in Section 1.b).

11 We focus on the period between 2000 and 2016 because about a third of the new housing built since 1970 was built since 2000, and because data is not available, or is not comparable across decades, for many of the indicators that we examine prior to 2000. Growth in the housing supply did not keep up with growth in the adult population or in jobs, however, whether we measure the changes from 1990 or from 2000.

Table 7: Housing Units and Population in 2000 and 2016

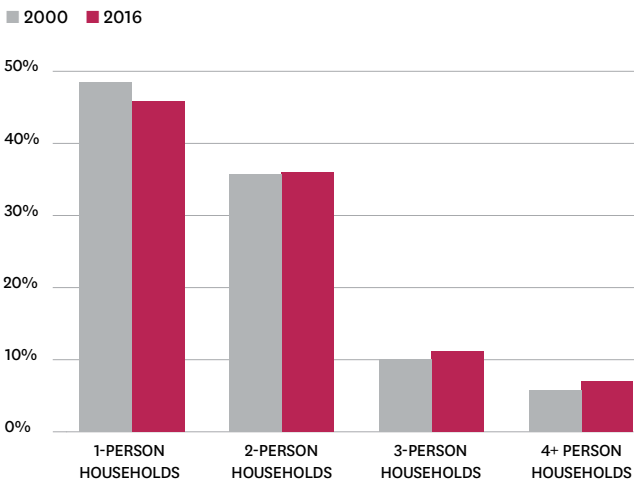
		New York City	*Bronx*	*Brooklyn*	*Manhattan*	*Queens*	*Staten Island*
Housing Units	2000	3,200,912	490,659	930,866	798,144	817,250	163,993
	2016	3,463,870	525,788	1,031,125	875,990	851,576	179,391
	Percent Change	8.2%	7.2%	10.8%	9.8%	4.2%	9.4%
Total Population	2000	8,008,278	1,332,650	2,465,326	1,537,195	2,229,379	443,728
	2016	8,537,673	1,455,720	2,629,150	1,643,734	2,333,054	476,015
	Percent Change	6.6%	9.2%	6.6%	6.9%	4.7%	7.3%
Adult Population	2000	6,078,005	936,801	1,806,663	1,281,597	1,721,954	330,990
	2016	6,737,919	1,087,399	2,019,764	1,402,998	1,856,645	371,113
	Percent Change	10.9%	16.1%	11.8%	9.5%	7.8%	12.1%

Sources: Neighborhood Change Database, American Community Survey, NYU Furman Center

than overall population growth, because every household has an adult, but many households do not have a child. The size of adult-only households also has grown (see Figure 11). That may mean that adults' preferences are changing and they increasingly want to live with roommates. But it may mean instead that they cannot afford to live on their own because rents or prices for units sized for a single adult or an adult couple are higher than they can afford. Again, that suggests that, as a growing number of adults are living in the city in adult-only households, the housing supply is not increasing enough to adequately moderate pressures on prices resulting from that rising demand.

Further, to the extent that the adult-only households have higher incomes (perhaps because they have multiple wage earners), they likely are able to spend more on housing than households with children or others in the household who are not wage earners, and thereby outbid those other households for the limited stock, which increases the cost of the housing for everyone.

Figure 11: Distribution of Household Size for Adult-Only Households, New York City



Sources: IPUMS-USA, NYU Furman Center

Increases in employment since 2000 also likely have affected the demand for housing. In 2016, New York City had 4,346,000 jobs, 16.5 percent more than it had in 2000. The relationship between job growth and the need for housing is complex because the job market is regional, and some jobs will be filled by people who prefer to live, and do live, outside the city. Further, even for those who want to live and work in the city, a person who takes a new job but was not employed and was already living in the city will not generate the need for an additional unit unless the job causes the person to form a separate household. Nevertheless, all other things being equal, movement in the jobs/housing ratio can be instructive, because a higher ratio likely signals increased pressure on rents and prices. While New York City's jobs-to-housing ratio fell between 2000 and 2010, it increased by 2016 to above its year-2000 level (see Table 8), so that there were 1.25 jobs for every housing unit in the city.

Table 8: Jobs, Housing and Jobs-Housing- Ratio

	2000	*2010*	*2016*	*Change 2000 to 2016*
Jobs (1,000s)	3,732	3,731	4,346	16.5%
Housing Units (1,000s)	3,200	3,371	3,463	8.2%
Jobs/Housing Ratio	1.17	1.11	1.25	

Sources: American Community Survey, NYU Furman Center

In sum, the overall population, especially the adult population, has grown substantially, the size of adult-only households has grown, and both the number of jobs and the jobs/housing ratio have increased. All those factors signal that more households are seeking housing, and unless housing supply is adequate to relieve the pressure that increased demand places on prices, rents and housing values will increase.

b. Measures of the Adequacy of the Housing Supply

The rental vacancy rate is often looked to as an indirect measure of whether housing supply is expanding at the same rate as demand. An increasing rental vacancy rate suggests that supply is matching demand better than it was in the past (of course, at some point, an increasing vacancy rate signals that supply growth is outpacing growth in demand). Economic research suggests that a "natural" vacancy rate (one that allows efficient choice by renters at the lowest cost to owners) will differ from city to city, and even within a city (by neighbrhood or by housing type). The benchmark most commonly used in New York is whether the vacancy rate falls below five percent, the level treated as an emergency authorizing the application of rent regulation.[12] In 2016, the rental vacancy rate was 3.6 percent,[13] well below the "emergency" threshold. The rate also is well below that of the nation's other large cities.[14]

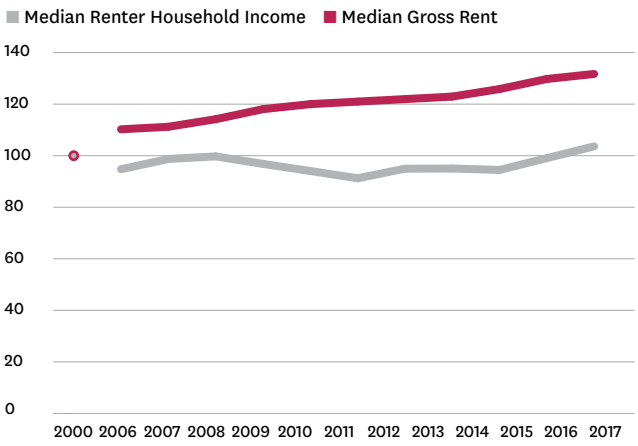
Another indicator of whether supply is meeting the needs of households is the rate of severe over-crowding (defined as more than 1.5 persons per room). The rate of severe over-crowding increased from 3.3 percent of all renters in 2010 to 3.7 percent in 2016.[15] Further, over-crowding is one of those measures that is likely to be under-estimated because, for example, households may not report members of the household who are undocumented.

Changes in household size also may be an indicator of whether housing supply is growing at the same rate as demand. Average household size is the total number of people in occupied housing units divided by the number of occupied household units, so it indicates whether the resident population of the city is living in more or fewer housing units at any particular time. In fact, the city's average household size has grown. In 2016, the average household in New York City had 2.68 people, up from 2.59 people in 2000, and from 2.50 people in 1980. The changes in the city's average household size largely track those of the country's: the average household size for all U.S. households was 2.59 in 2000 and 2.65 in 2016.

Household size is a function of many factors, including demographic changes such as the increase in adult-only households noted above and an aging population, as well as cultural views about when adult children should move to their own homes. But it is likely also influenced by the cost of housing, so the fact that more people are occupying a housing unit in 2016 than they were in 2000 is one indication that housing is not as affordable, which may be evidence that additional supply is needed. It should be noted that very small changes in household size make a significant difference: had the average household size in 2016 been 2.59 people (like it was in 2000), the city would have needed another 113,000 occupied units[16] to house its population in households of that size.

Finally, a key indicator of whether a city has enough housing, of course, is the availability of housing affordable to all of its residents. Rents in New York City have risen much more than incomes since 2000 (see Figure 12). Between 2000 and 2016, median rent rose by 31.2 percent while median renter income only increased by 3.6 percent.

Figure 12: Index of Real Median Gross Rent and Real Median Renter Income, New York City (Index=100 in 2000)



Sources: U.S. Census Bureau, American Community Survey, NYU Furman Center

12 N.Y. Unconsol. Law § 8623 (McKinney 2018).

13 American Community Survey.

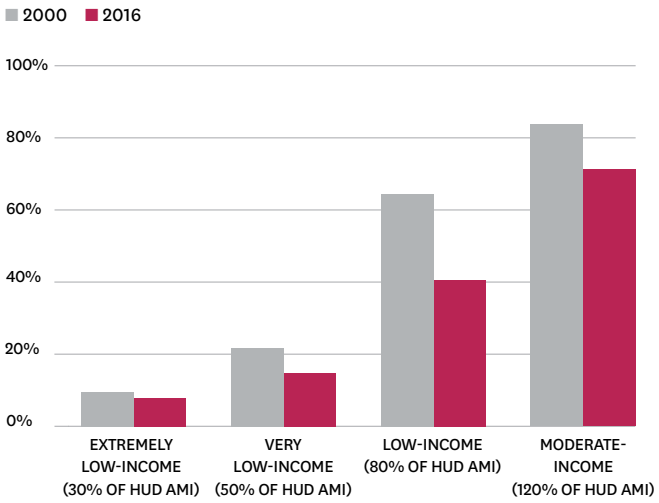
14 Based on the American Community Survey 2016 1-year estimates, the largest 50 cities in 2016 had an average rental vacancy rate of 5.9 percent.

15 At the 90 percent confidence level, the share of renter households that were severely crowded in 2010 was 3.3 percent plus or minus 0.1 percent and in 2016 was 3.7 percent plus or minus 0.2 percent.

16 In 2016, there were about 8,360,689 New Yorkers living in about 3,114,811 housing units (excluding those living in group quarters such as dorms or nursing homes). In order to maintain an average household size of 2.59, there would need to be 3,228,065 occupied housing units (8,360,689/2.59).

Despite all the effort that has been made over the past few decades to subsidize the constructon or rehabilitation of housing to make it affordable to low- and moderate-income households (see Section 1.f above), there is still a significant mismatch between the rents New Yorkers can afford to pay and the cost of units available for rent. Figure 13 shows the share of recently available units (units that turned over within the past 12 months) that were affordable to households at different income levels in 2000 and 2016. Less than 10 percent of the recently available rental units were affordable to extremely low-income households (those making $24,500 or less for a family of three in 2016). Even for households at 80 percent of area median income ($65,250 for a family of three in 2016), only 40.5 percent of recently available rental units were affordable—a decline of nearly 24 percentage points since 2000.

Figure 13: Share of Recently Available Rental Units Affordable to Low- and Moderate-Income Households, New York City



Sources: IPUMS-USA, U.S. Department of Housing and Urban Development Section 8/HOME Program Income Guidelines, NYU Furman Center

Note: Recently available units are defined as affordable to a household if a unit's gross rent (rent plus electricity and heating fuel costs; see median rent definition) is less than 30 percent of the household's gross monthly income. For more information, see the Indicator Definitions and Rankings section in Part 3 of this report.

The need for more housing renting at rates affordable to moderate and low-income households is acute. While units affordable for a broader range of New Yorkers do not necessarily need to be the newly constructed, adding new supply at lower rents brings housing on line faster than waiting for older units to become cheaper. But rents for newly constructed units and the incomes of the households living in them have risen significantly more than those for older units (see Table 9). As Table 9 reveals, the gap between the median rent for newly constructed units and the median rent in the city has grown in recent years. In the year 2000, the median rent for recently constructed units was only $50/month more than the median rent for all other units; in 2016, that gap had widened to $400/month (in constant 2017 dollars). In the year 2000, the median household income of renters in recently constructed units was lower than the median household income of all other renters; but in 2016, the median renter in newly constructed units had a household income that was one-third higher than the median income of all other renters. Had the new units not been built, those higher-income renters might very well have bid up the prices of other units. Nevertheless, the fact that the incomes of those who are renting units in recently built buildings are so much higher than they have been in the past suggests that there also may be a need for new construction at lower price points.

Table 9: Real Median Rent and Real Median Renter Income of Recently Built Housing Units (2017$), New York City

	2000		*2016*	
	Median Rent	*Median Renter Household Income*	*Median Rent*	*Median Renter Household Income*
All Rental Units	$1,025	$44,150	$1,350	$45,875
Rental Units Built in Previous 10 Years	$1,075	$41,200	$1,725	$61,175
All Other Rental Units	$1,025	$44,150	$1,325	$45,875
Difference Between Rental Units Built in Previous 10 Years and All Other Rental Units	*$50*	*-$2,950*	*$400*	*$15,300*

Sources: IPUMS-USA, NYU Furman Center

Note: For 2000, rental units built in previous 10 years covers renter households living in buildings built between 1990 and 1999. For 2016, rental units built in previous 10 years covers renter households in living in buildings built between 2006 and 2016. Values are rounded to $25.

Conclusion

New York City has seen a considerable number of new housing units constructed in the city over the past few decades. But there are a number of signs that even the increased supply is not adequate given increased demand for housing in the city. The adult population and the number of jobs in the city have grown faster than the number of housing units since 2000. Household sizes are larger, and more households are severely over-crowded. Vacancy rates remain low, and the share of housing affordable to the city's low- and moderate-income households fell significantly between 2000 and 2016. While data alone cannot answer the question of whether the city has enough housing, these measures suggest that more housing is needed, and especially that more housing is needed for the nearly 70 percent of the city's households who make moderate or lower incomes.

Methods

a.Data Sources

Unless otherwise noted, our analysis primarily uses data from the U.S. Census Bureau, including the decennial Census (1970, 1980, 1990, 2000, 2010) and the American Community Survey (ACS) (2006-2016). In addition to data accessed via American FactFinder, we use two additional sources:

Neighborhood Change Database

In order to track neighborhood change, we use the Neighborhood Change Database (NCDB) 2010, which is compiled by GeoLytics and the Urban Institute with support from the Rockefeller Foundation (2010). The NCDB provides census tract data from the U.S. Census Bureau back to 1970 recalculated to match the census tract boundaries from 2010. We then aggregate census tract data to sub-borough areas as sub-borough areas are defined today.

Public Use Microdata Samples

In cases where pre-tabulated data is not available, we use the Public Use Microdata Sample (PUMS), provided by IPUMS-USA at the University of Minnesota. The PUMS samples are anonymized individual-level data that allow us to calculate detailed characteristics of the population and households.

b. Comparing the Rental Vacancy Rate Across Sources

The vacancy rates presented in this report are from the decennial censuses or the ACS. Though both measures are valid, vacancy rates from the Census and the ACS cannot be compared. At the national level, there are statistically-significant differences between the counts of occupied and vacant housing units from the 2010 Census and the 2010 ACS 1-Year Estimates. Differences between the Census and ACS can potentially be attributed to different reference periods, interview periods, and residence rules; different address frames; coverage improvement procedures used for the Census but not the ACS; and issues with finding knowledgeable respondents. For more discussion, see: https://www.census.gov/library/working-papers/2011/acs/2011_Griffin_03.html.

The New York City Housing and Vacancy Survey (HVS), which is used by New York City for the purposes of determining whether rent regulation may be continued, also measures the rental vacancy rate, though it cannot be compared to the Census or ACS. The 2017 HVS rental vacancy rate was 3.63 percent.

Appendix A: Housing and Population by Borough and Neighborhood, 2000 to 2016

	Total Housing Units			Total Population			Total Population 18+		
City/Borough/Sub-Borough Area	*2000*	*2016*	*% Change*	*2000*	*2016*	*% Change*	*2000*	*2016*	*% Change*
New York City	**3,200,912**	**3,463,870**	**8.2%**	**8,008,278**	**8,537,673**	**6.6%**	**6,078,005**	**6,737,919**	**10.9%**
Bronx	**490,659**	**525,788**	**7.2%**	**1,332,650**	**1,455,720**	**9.2%**	**936,801**	**1,087,399**	**16.1%**
BX 01 Mott Haven/Hunts Point	45,596	57,275	25.6%	143,874	166,272	15.6%	97,197	118,899	22.3%
BX 02 Morrisania/Belmont	50,197	62,272	24.1%	141,474	174,740	23.5%	92,045	126,967	37.9%
BX 03 Highbridge/S. Concourse	45,575	52,541	15.3%	132,018	151,835	15.0%	87,508	107,483	22.8%
BX 04 University Hts/Fordham	44,776	48,893	9.2%	133,871	135,115	0.9%	86,060	98,140	14.0%
BX 05 Kingsbridge Hts/Moshulu	42,736	48,352	13.1%	119,604	138,899	16.1%	82,128	101,982	24.2%
BX 06 Riverdale/Kingsbridge	45,451	44,552	-2.0%	108,475	108,865	0.4%	83,520	88,039	5.4%
BX 07 Soundview/Parkchester	66,293	66,637	0.5%	175,198	193,240	10.3%	122,399	142,430	16.4%
BX 08 Throgs Neck/Co-op City	48,493	45,659	-5.8%	111,221	111,431	0.2%	88,192	89,187	1.1%
BX 09 Pelham Parkway	46,886	47,176	0.6%	120,158	124,632	3.7%	91,530	96,818	5.8%
BX 10 Williamsbridge/Baychester	54,656	52,431	-4.1%	146,757	150,691	2.7%	106,222	117,454	10.6%
Brooklyn	**930,866**	**1,031,125**	**10.8%**	**2,465,326**	**2,629,150**	**6.6%**	**1,806,663**	**2,019,764**	**11.8%**
BK 01 Williamsburg/Greenpoint	52,897	70,240	32.8%	142,030	166,361	17.1%	101,809	129,498	27.2%
BK 02 Brooklyn Hts/Ft Greene	52,621	66,909	27.2%	115,511	143,328	24.1%	93,357	118,952	27.4%
BK 03 Bedford Stuyvesant	48,830	58,114	19.0%	120,968	148,237	22.5%	81,968	113,258	38.2%
BK 04 Bushwick	39,363	52,009	32.1%	120,374	139,306	15.7%	80,865	111,727	38.2%
BK 05 East New York/Starrett City	50,338	61,865	22.9%	146,804	160,769	9.5%	99,922	119,465	19.6%
BK 06 Park Slope/Carroll Gardens	49,871	51,064	2.4%	105,494	114,007	8.1%	85,532	87,107	1.8%
BK 07 Sunset Park	46,620	48,750	4.6%	139,679	149,399	7.0%	103,517	114,228	10.3%
BK 08 N. Crown Hts/Prospect Hts	50,827	60,882	19.8%	122,863	134,788	9.7%	89,030	110,553	24.2%
BK 09 South Crown Heights	41,778	46,293	10.8%	112,505	110,382	-1.9%	81,164	85,428	5.3%
BK 10 Bay Ridge	51,834	52,340	1.0%	118,869	118,804	-0.1%	96,208	95,888	-0.3%
BK 11 Bensonhurst	65,563	68,644	4.7%	171,369	189,426	10.5%	136,603	148,881	9.0%
BK 12 Borough Park	51,140	45,881	-10.3%	159,099	151,250	-4.9%	106,399	94,723	-11.0%
BK 13 Coney Island	48,594	50,618	4.2%	117,149	116,847	-0.3%	91,727	94,413	2.9%
BK 14 Flatbush	58,717	60,496	3.0%	166,448	163,620	-1.7%	118,597	118,922	0.3%
BK 15 Sheepshead Bay/Gravesend	58,697	62,174	5.9%	147,164	159,017	8.1%	115,029	124,912	8.6%
BK 16 Brownsville/Ocean Hill	42,070	48,734	15.8%	117,015	109,658	-6.3%	74,806	83,922	12.2%
BK 17 East Flatbush	51,226	55,389	8.1%	145,537	145,860	0.2%	106,279	109,700	3.2%
BK 18 Flatlands/Canarsie	69,880	70,723	1.2%	196,448	208,091	5.9%	143,851	158,187	10.0%
Manhattan	**798,144**	**875,990**	**9.8%**	**1,537,195**	**1,643,734**	**6.9%**	**1,281,597**	**1,402,998**	**9.5%**
MN 01 Greenwich Vlg/Financial Dist	73,904	87,577	18.5%	125,929	152,813	21.3%	114,410	131,641	15.1%
MN 02 Lower East Side/Chinatown	72,751	81,611	12.2%	166,042	159,296	-4.1%	138,184	142,019	2.8%
MN 03 Chelsea/Clinton/Midtown	79,310	103,852	30.9%	122,162	140,247	14.8%	112,430	128,800	14.6%
MN 04 Stuyvesant Town/Turtle Bay	97,071	94,974	-2.2%	145,660	141,162	-3.1%	134,663	126,138	-6.3%
MN 05 Upper West Side	113,609	121,595	7.0%	191,953	189,492	-1.3%	167,483	166,027	-0.9%
MN 06 Upper East Side	135,162	133,836	-1.0%	214,903	219,004	1.9%	189,262	187,762	-0.8%
MN 07 Mrngside Hts/Hmltn Hts	51,101	51,246	0.3%	129,352	125,195	-3.2%	101,390	105,123	3.7%
MN 08 Central Harlem	53,682	65,056	21.2%	107,554	143,487	33.4%	78,305	114,784	46.6%
MN 09 East Harlem	44,630	55,045	23.3%	115,349	134,279	16.4%	83,660	105,923	26.6%
MN 10 Washington Hts/Inwood	76,924	81,198	5.6%	218,291	238,759	9.4%	161,810	194,781	20.4%
Queens	**817,250**	**851,576**	**4.2%**	**2,229,379**	**2,333,054**	**4.7%**	**1,721,954**	**1,856,645**	7.8%
QN 01 Astoria	77,770	83,958	8.0%	191,591	171,988	-10.2%	153,313	146,792	-4.3%
QN 02 Sunnyside/Woodside	50,844	60,726	19.4%	130,982	135,767	3.7%	106,061	114,905	8.3%
QN 03 Jackson Heights	57,700	59,573	3.2%	181,141	166,144	-8.3%	137,896	129,222	-6.3%
QN 04 Elmhurst/Corona	45,366	47,750	5.3%	143,166	141,167	-1.4%	110,179	107,902	-2.1%
QN 05 Middle Village/Ridgewood	65,557	67,232	2.6%	167,295	192,600	15.1%	128,953	152,031	17.9%
QN 06 Rego Park/Forest Hills	53,383	56,714	6.2%	111,379	111,730	0.3%	93,688	93,984	0.3%
QN 07 Flushing/Whitestone	92,514	95,247	3.0%	244,257	245,864	0.7%	196,219	202,066	3.0%
QN 08 Hillcrest/Fresh Meadows	56,395	59,330	5.2%	148,772	166,115	11.7%	115,610	130,804	13.1%
QN 09 Ozone Park/Woodhaven	48,114	49,286	2.4%	142,449	164,094	15.2%	105,593	128,601	21.8%
QN 10 S. Ozone Pk/Howard Beach	42,261	41,453	-1.9%	125,937	135,422	7.5%	95,141	107,057	12.5%
QN 11 Bayside/Little Neck	46,787	45,963	-1.8%	118,419	117,381	-0.9%	95,142	93,377	-1.9%
QN 12 Jamaica	74,483	75,907	1.9%	221,102	243,300	10.0%	160,926	188,610	17.2%
QN 13 Queens Village	64,380	63,038	-2.1%	196,178	214,163	9.2%	146,935	171,831	16.9%
QN 14 Rockaways	41,696	45,418	8.9%	106,711	127,381	19.4%	76,298	89,525	17.3%
Staten Island	**163,993**	**179,391**	**9.4%**	**443,728**	**476,015**	**7.3%**	**330,990**	**371,113**	**12.1%**
SI 01 North Shore	61,351	65,652	7.0%	163,329	174,943	7.1%	118,567	133,547	12.6%
SI 02 Mid-Island	45,999	51,861	12.7%	123,936	142,815	15.2%	95,184	111,656	17.3%
SI 03 South Shore	56,643	61,878	9.2%	156,463	158,257	1.1%	117,239	125,910	7.4%

Data Sources: American Community Survey, New York City Department of Buildings, NYU Furman Center

Appendix B: Recently Built Housing Units and Building Permits by Sub-Borough Area

City/Borough/Sub-Borough Area		*Units in 2016 Built Between 2000 and 2016*	*Units Authorized by New Building Permits in 2015 through 2017*
New York City		273,260	87,130
Bronx		37,863	13,036
BX 01	Mott Haven/Hunts Point	7,681	2,766
BX 02	Morrisania/Belmont	9,665	3,661
BX 03	Highbridge/South Concourse	4,707	1,700
BX 04	University Heights/Fordham	2,714	1,333
BX 05	Kingsbridge Heights/Moshulu	1,139	1,154
BX 06	Riverdale/Kingsbridge	1,396	686
BX 07	Soundview/Parkchester	2,917	870
BX 08	Throgs Neck/Co-op City	3,451	196
BX 09	Pelham Parkway	1,322	294
BX 10	Williamsbridge/Baychester	2,871	376
Brooklyn		80,142	34,283
BK 01	Williamsburg/Greenpoint	14,066	7,344
BK 02	Brooklyn Heights/Fort Greene	10,572	5,797
BK 03	Bedford Stuyvesant	6,803	2,932
BK 04	Bushwick	6,595	3,337
BK 05	East New York/Starrett City	6,645	1,344
BK 06	Park Slope/Carroll Gardens	3,845	1,633
BK 07	Sunset Park	2,762	363
BK 08	North Crown Heights/Prospect Heights	2,835	2,217
BK 09	South Crown Heights	2,028	2,388
BK 10	Bay Ridge	1,180	59
BK 11	Bensonhurst	2,815	378
BK 12	Borough Park	2,603	539
BK 13	Coney Island	4,035	1,110
BK 14	Flatbush	924	1,435
BK 15	Sheepshead Bay/Gravesend	2,506	774
BK 16	Brownsville/Ocean Hill	6,803	1,443
BK 17	East Flatbush	1,760	1,113
BK 18	Flatlands/Canarsie	1,365	77
Manhattan		79,886	18,709
MN 01	Greenwich Village/Financial District	9,354	2,444
MN 02	Lower East Side/Chinatown	4,613	1,917
MN 03	Chelsea/Clinton/Midtown	28,258	7,026
MN 04	Stuyvesant Town/Turtle Bay	5,582	1,553
MN 05	Upper West Side	6,937	2,246
MN 06	Upper East Side	6,177	454
MN 07	Morningside Heights/Hamilton Heights	1,455	140
MN 08	Central Harlem	8,350	953
MN 09	East Harlem	7,969	1,763
MN 10	Washington Heights/Inwood	1,191	213
Queens		57,360	19,290
QN 01	Astoria	6,855	4,836
QN 02	Sunnyside/Woodside	10,058	6,422
QN 03	Jackson Heights	3,562	226
QN 04	Elmhurst/Corona	3,353	937
QN 05	Middle Village/Ridgewood	2,538	573
QN 06	Rego Park/Forest Hills	1,825	222
QN 07	Flushing/Whitestone	5,630	1,818
QN 08	Hillcrest/Fresh Meadows	3,235	423
QN 09	Ozone Park/Woodhaven	2,488	157
QN 10	South Ozone Park/Howard Beach	1,742	92
QN 11	Bayside/Little Neck	1,634	254
QN 12	Jamaica	4,652	2,097
QN 13	Queens Village	2,131	109
QN 14	Rockaways	7,657	1,124
Staten Island		18,009	1,812
SI 01	North Shore	6,659	550
SI 02	Mid-Island	4,534	647
SI 03	South Shore	6,816	615

Data Sources: American Community Survey, New York City Department of Buildings, NYU Furman Center

NYU Furman Center

About the NYU Furman Center

The NYU Furman Center advances research and debate on housing, neighborhoods, and urban policy.

Established in 1995, it is a joint center of the New York University School of Law and the Robert F. Wagner Graduate School of Public Service. Its mission is to:

Provide objective academic and empirical research on legal and public policy issues involving land use, real estate, housing, and urban affairs in the United States;

Promote frank and productive discussions among elected and appointed officials, leaders of the real estate industry, leaders of non-profit housing and community development organizations, scholars, and students about critical issues in land use, real estate, and urban policy;

Present essential data and analysis about the state of New York City's housing and neighborhoods to those involved in land use, real estate development, community economic development, housing, urban economics, and urban policy; and

Train the next generation of urban policy leaders—including researchers, analysts, and practitioners—by fostering an enriching environment where students meaningfully contribute to the Center's work.

The Center's Faculty Directors are Vicki Been, Boxer Family Professor of Law at NYU School of Law; Ingrid Gould Ellen, Paulette Goddard Professor of Urban Policy and Planning at NYU's Robert F. Wagner Graduate School of Public Service; and Katherine O'Regan, Professor of Public Policy and Planning at NYU's Robert F. Wagner Graduate School of Public Service. Jessica Yager is the Center's Executive Director. Our staff regularly collaborates with faculty and researchers from the School of Law, the Robert F. Wagner Graduate School of Public Service, the Faculty of Arts and Sciences, and many other research organizations at NYU and beyond.

NYU Furman Center
Wilf Hall, 139 MacDougal Street, 2nd floor
New York, NY 10012
212-998-6713
furmancenter@nyu.edu
@FurmanCenterNYU
www.furmancenter.org

The NYU Furman Center would like to thank the following people, whose leadership, advice, and support are invaluable:

Andrew Hamilton
President
New York University

Sherry A. Glied
Dean
Robert F. Wagner Graduate School of Public Service,
New York University

Trevor Morrison
Dean
New York University School of Law

NYU Furman Center Board of Advisors

Daniel Alger
Vice President
Goldman Sachs

Juan Barahona
BFC Partners

Richard Baron
Co-Founder and Chairman
McCormack Baron Salazar

Zachary Bernstein
Partner, Real Estate
Fried, Frank, Harris,
Shriver & Jacobson LLP

Leonard Boxer JD '63
Partner
Stroock & Stroock & Lavan LLP

Jeffrey I. Brodsky MBA '82
Vice Chairman
Related Companies

Erica F. Buckley
Partner
Nixon Peabody LLP

Jim Buckley
Executive Director
University Neighborhood Housing Program

Rafael Cestero
President and Chief Executive Officer
The Community Preservation Corporation

Dan Chorost JD '96
Principal
Sive, Paget & Riesel P.C.

Martin Dunn
President
Dunn Development Corp.

Jake Elghanayan JD '12
Senior Vice President
TF Cornerstone

Eric Enderlin (ex officio)
President
New York City Housing Development Corporation

Robert Ezrapour
Vice President
Artimus

Bernard Falk JD/MBA '75
Senior Vice President and General Counsel
Loeb Partners Realty LLC

Peter Fass LLM '64
Partner
Proskauer Rose LLP

Mark Ginsberg
Partner
Curtis + Ginsberg Architects LLP

John P. Gleber
Managing Director, Head of Tax Exempt and Affordable Housing
Deutsche Bank

Todd Gomez
Senior Vice President
Bank of America Merrill Lynch

Colvin Grannum
President and Chief Executive Officer
Bedford Stuyvesant Restoration Corporation

Bernell Grier
Executive Director
IMPACCT Brooklyn

Fred Harris MS '76, JD '79
Special Advisor for Real Estate Development
Jonathan Rose Companies

John Heppolette
Co-Head and Managing Director
Citi Community Capital

Marc Jahr
Senior Advisor
Forsyth Street Advisors LLC

David Karnovsky
Partner
Fried, Frank, Harris,
Shriver & Jacobson LLP

Aaron Koffman
Principal
The Hudson Companies, Inc.

Kevin Lalezarian BS '99
Principal
Lalezarian Properties

Holly M. Leicht (ex officio)
Executive Vice President, Real Estate Development & Planning
Empire State Development

Anthony Mannarino
Executive Vice President
Extell Development Company

Timothy J. Mayopoulos JD '84
President and Chief Executive Officer
Fannie Mae

Patrick McEnerney
Managing Director
Deutsche Bank

Marion McFadden
Vice President, Public Policy
Enterprise Community Partners

Jonathan Mechanic JD '77
Chair, Real Estate Department
Fried, Frank, Harris,
Shriver & Jacobson LLP

Manuel Menendez, Jr.
Senior Vice President, Multifamily Chief Credit Officer
Fannie Mae

Ron Moelis JD '82
Chief Executive Officer and Founding Partner
L + M Development Partners, Inc.

Jonathan Moore
Managing Director, Real Estate, Multifamily
Brookfield Property Group

Jason Muss JD '96
Principal
Muss Development LLC

Melissa Pianko
Managing Director
The Blackstone Group

Angela Pinsky MUP '05
Executive Director
Association for a Better New York

Herbert Podell BA '54, JD '58
Senior Partner
Podell, Schwartz, Schechter & Banfield, LLP

Gary Rodney MUP '99
Chairman
CREA, LLC

Stephen Ross LLM '66
Chairman and Founder
Related Companies

Michael Rudin MS'12
Vice President
Rudin Management Company, Inc.

Mitchell Rutter JD '80
Chief Executive Officer and Founding Partner
Essex Capital Partners, Ltd.

Eugene Schneur
Managing Director
Omni New York LLC

David Schwartz
Principal
Slate Property Group

Denise Scott
Executive Vice President for Programs
Local Initiatives Support Corporation

Jesse Sharf JD '86
Partner; Co-Chair, Real Estate Department
Gibson, Dunn & Crutcher LLP

Douglas Shoemaker
President
Mercy Housing California

Larry Silverstein BA '52
Chairman
Silverstein Properties

Richard Singer
Partner
Hirschen Singer & Epstein LLP

Maria Torres-Springer (ex officio)
Commissioner
New York City Department of Housing Preservation and Development

RuthAnne Visnauskas MUP '05 (ex officio)
Commissioner and Chief Executive Officer
New York State Homes and Community Renewal

Jon Vogel JD '96
Vice President of Development
AvalonBay Communities, Inc.

Elise Wagner JD '81
Partner
Kramer Levin Naftalis & Frankel LLP

David Walsh
Senior Vice President of Community Development Banking
JPMorgan Chase & Co.

Adam Weinstein
President and Chief Executive Officer
Phipps Houses

Marc Weisman LLM '80
Chief Operating Officer
JD Carlisle LLC
President
Cheltenham Enterprises, Inc.

Aviva Yakren BA '94
Partner
Sidley Austin LLP

Aaron Yowell JD '07
Chief Innovation Officer
Nixon Peabody LLP

Wilf Hall
139 MacDougal Street, 2nd floor
New York, NY 10012
212-998-6713

furmancenter@nyu.edu
@FurmanCenterNYU