

Designing New York: Streetscapes for Wellness

Designing New York: Streetscapes for Wellness



NYCDESIGN

NYC Public Design Commission
City Hall, Third Floor, New York, NY 10007
nyc.gov/designcommission

NYCDESIGN

NYCDESIGN

ASLA
NEW YORK

THE FINE ARTS FEDERATION OF NEW YORK

NYC
PLANNING

Designing
New York:
Streetscapes
for Wellness



The City of New York
Mayor Eric Adams

Maria Torres-Springer
 Deputy Mayor for Economic
 and Workforce Development

© 2022
 NYC Public Design Commission
 City Hall, Third Floor, New York, NY 10007
 nyc.gov/designcommission

This publication is a collaboration of the New York City Public Design Commission, New York Chapter of the American Society of Landscape Architects, The Fine Arts Federation of New York, and the New York City Department of City Planning Urban Design Office.

Thank you to the Associates of the Art Commission and the New York Chapter of the American Society of Landscape Architects for their generous support toward this publication.

Thank you to our agency partners:
 New York City Department of City Planning
 New York City Department of Transportation
 New York City Department of Health and Mental Hygiene
 New York City Department of Parks and Recreation

And, thank you to our broad interagency working group with representatives from a dozen agencies and the New York City Office of the Mayor.

Disclaimer: The New York City Public Design Commission does not guarantee, warrant, or make representations that the information in this document is complete, accurate, or current. PDC assumes no responsibility for the application of the material or information contained herein nor for any error, omissions, or other discrepancies. Nothing in the document is intended to create nor does it create any enforceable rights, remedies, entitlements, or obligations.

Contents

A Letter from Mayor Adams	05
A Letter from Deputy Mayor Torres-Springer	06
Introduction	09
About this Publication	13
What's in a Street?	23
Case Studies	32
Open Streets	36
Collaborative Recovery	48
Streets for Justice	62
Parks, Plazas, and Peripheries	74
Under the Elevated	86
Sharing the Street	98
Appendix	113
Community Health Profiles	114
Community Demographics	116
Key Terms	117
Resources	119
Citations	120
Acknowledgements	121
Image Credits	124



Street Lab Teens facilitate a hands-free obstacle course in collaboration with nonprofit organization, Uptown Grand Central, at the Pleasant Avenue Open Street in East Harlem.

November 2022

To My Fellow New Yorkers:

I am pleased to join the New York City Public Design Commission (PDC) in introducing *Designing New York: Streetscapes for Wellness*. As our Administration reflects on the impact of the COVID-19 pandemic and plans for our city's future, we must work collectively to make it more resilient to future environmental and public health emergencies—and it is vital that we do so in an equitable way. Every New Yorker, regardless of their neighborhood or race, deserves nearby access to high-quality open spaces that are cleaner, greener, safer, and more vibrant.

Featuring extensive research and broad case studies, this report shares creative strategies, interventions, and designs that showcase New York City's innovative spirit and openness to reimagining our public realm. The leadership of the PDC is essential in our Administration's mission to improve the quality of public streets and open spaces citywide and to ensure that New Yorkers throughout the five boroughs will equitably reap the benefits associated with public realm design improvements.

Designing New York: Streetscapes for Wellness is the product of a broad interagency collaboration and extensive discussions with community groups and nonprofit partners, and it illustrates how the design of our city streetscapes and public open spaces plays a critical role in improving our physical, mental, emotional, and environmental health. I invite you to join us in making these visions a reality as we rebuild, renew, and reinvent the streets of the greatest city in the world.

Sincerely,

Eric Adams
Mayor

November 2022

To My Fellow New Yorkers:

Throughout history, the people of New York City have proven themselves to be resilient and innovative. Over the past couple of years, we witnessed communities banding together and collaborating on solutions that have fostered social wellbeing and helped local businesses stay afloat. As we plan the recovery of our city, we look to these localized initiatives for guidance.

The case studies within *Designing New York: Streetscapes for Wellness* showcase ideas from some of our city's most creative innovators, and they also inspire opportunities for growth. This publication shows the great value of public-private partnerships and community collaborations.

The lenses of wellness—physical health, mental well-being, social adhesion, and environmental resilience—highlighted in this book should continue to inform how we plan, design, maintain, and program our public realm for years to come. Investing energy into these efforts is central to our administration's goals of building a safer, more equitable, and resilient city.

Sincerely,



Maria Torres-Springer
Deputy Mayor



Pedestrians admire *Rice Terraces*, the vibrant 4,800-square-foot asphalt art mural by Dasic Fernandez, painted in 2021 on Doyers Street in Chinatown, Manhattan.

“Well-designed and green streetscapes can improve the quality of life for New Yorkers by reducing the heat-island effect, providing respite and shade, and encouraging physical activity.”

— Signe Nielsen, former President, NYC Public Design Commission;
Founding Principal, MNLA

A Changing Course for Streets in New York

Comprising more than a quarter of New York City’s land area, streetscapes are arguably one of the city’s most readily accessed and underutilized public resources. With approximately 6,300 miles of streets and highways, New York City is defined and shaped by its streets.¹ These public corridors help us navigate through the city and connect with one another. Streetscapes comprise roadbeds where vehicles drive and park, bike lanes, and the sidewalks and plazas where people walk and socialize. They are lined with street furniture, signage, newsstands, bus stops, street trees, and many other amenities that provide neighborhood services along with social and ecological benefits that help sustain the city.

Well-designed and programmed public streetscapes can improve health and mental wellbeing, encourage physical activity and social interaction, and make people feel safe and welcome. A holistic and integrated approach for a safer public realm addresses public health concerns while improving aesthetics, usability, and public perception to support an inclusive and thriving urban environment and public life. Design strategies such as open streets, community engagement toolkits, retail and restaurant extensions, public artworks, and expanded micromobility lanes for forms of personal transportation including human- or electric-powered bikes, scooters, and skateboards, can contribute to this effort.

Corridors for Connection

Though it is increasingly apparent that people-centered design strategies can contribute to improved quality of life in the public realm, most modern cities were designed and built with a focus on the automobile. After the Ford Model T became widely available in 1908, broad sidewalks and landscaped parkways in New York City were narrowed to provide more generous space for cars.² At the time, cars were considered a healthy improvement to the smelly, loud, and messy horse-drawn carriages.³ Coupled with the promise of greater individual autonomy, the “auto boom” fundamentally shifted the use of city streets and demonstrated the inextricable link between streets and quality of life.

Since the 1940s, city planning in the United States has been organized around vehicular efficiency. Robert Moses infamously razed lower-income communities of color to construct highways through and above them, segregating these communities and limiting their access to resources.⁴ Highways still act as barriers, cutting neighborhoods off from the waterfront, open spaces, transit hubs, social networks, and other communities. Further, they have negative impacts on quality of life, lead to increases in traffic-related injuries and fatalities, and spur health

issues for nearby residents, including higher asthma rates and lower cognitive function due to the emission of harmful pollutants.⁵

These inequities, created by a history of racism in urban planning, are persistent and difficult to eradicate and were further exacerbated by the COVID-19 pandemic. One non-profit organization, Robin Hood Foundation, utilized its poverty tracking tool to monitor the impact of the pandemic on different populations within New York City. The Foundation’s report finds that poverty indicators (e.g., food hardship, housing insecurity, and unemployment) affect Latinx and Black New Yorkers at significantly higher rates than neighboring white populations.⁶

Still, there are individuals who believe in the street’s power to improve a sense of community. In *The Death and Life of Great American Cities*, writer and activist Jane Jacobs is pointedly critical of the modernist urban planning theories implemented by Moses. Jacobs favors a dense city with walkable streets and healthy, active sidewalks and argues that a network of sidewalks and intersections permits more opportunities for casual pedestrian interactions, fostering safety, social cohesion, and “a web of public respect and trust.”⁷



◀ Vehicular traffic congestion, including along this car-dominated avenue in Manhattan, contributes to public health and environmental issues.



◀ NYC DOT’s annual Summer Streets event repurposes street space for non-car use, and invites anyone to play, walk, bike, skateboard, run, or relax along the corridor.

Streets for People

Today in New York City, unlike many American cities, only about half of households own a car.⁸ When considering the proportion of residents who are dependent upon non-car modes of transportation versus the number of drivers who live in the city, the physical distribution of public space reserved for car use is inequitable.⁹ Manhattan commuters use public transit at nearly twelve times the national rate, yet cars occupy an immense amount of space (both while driving and parked), and result in congestion, pollution, noise, and a lack of pedestrian safety.¹⁰

How can the streets of a city, so long entrenched within car culture, shift to benefit people? In recent decades, the mission of New York City’s Department of Transportation (NYC DOT) has refocused from the management of single-occupancy vehicular traffic toward the reallocation of street space to pedestrians, cyclists, and buses. NYC DOT has piloted protected bike lanes, curb extensions, pedestrian median refuges, and Open Streets, collecting data that showed reductions in vehicular speeding and injuries without increasing average vehicle travel times.

In early 2020, the sudden onset of the COVID-19 pandemic accelerated the notion that streets are

public amenities with the capacity to do more than just move cars. Public health precautions and lockdowns spurred City agencies to think creatively about how to provide areas for safe recreation and support local businesses. New York City witnessed an unprecedented need for added public open space, and longstanding social inequities were further exacerbated by unequal access to quality, people-centered public space. At the same time, reduced automobile traffic on the streets presented opportunities to reclaim the streets for non-vehicular use.

There is a growing expectation that streets can perform better and more equitably serve people by enhancing pedestrian and cyclist safety, mitigating pollutant emissions, slowing runoff, cooling urban spaces, encouraging active play and self-expression, allowing for moments of respite, and improving access to quality open spaces. The incredible outdoor experimentations that took place during the pandemic should provide inspiration for urban designers, planners, and policymakers as they look ahead to the future designs of public spaces.

About Streetscapes for Wellness

Streetscapes for Wellness is the result of a two-year collaborative research initiative between the New York City Public Design Commission (PDC), the New York Chapter of the American Society of Landscape Architects (ASLA-NY), The Fine Arts Federation of New York, and the New York City Department of City Planning Urban Design Office (NYC Planning). Dozens of other New York City agencies and individuals involved in the planning, design, and care of streetscape projects contributed their time and insights to this publication, including the Department of Health and Mental Hygiene (DOHMH), the Department of Parks & Recreation (NYC Parks), and the Department of Transportation (NYC DOT).

Early in the COVID-19 pandemic, when public realm interventions and programs were quickly evolving to address issues of health as well as social, racial, and climate justice, the project team altered the course of this initiative to focus on how alternative uses for streets can enhance public wellness. The selected case studies from New York City and a handful of other communities illustrate how innovative initiatives at a variety of scales may inform and inspire future visions for our streetscapes.

Most of these projects are temporary in nature and developed during the pandemic, when creativity flourished in the form of tactical urbanism that responded to critical health and economic needs. While the PDC has purview over permanent designs on City-owned streets, these temporary installations can act as proving grounds for future capital projects. The PDC is uniquely situated to help synthesize and guide how these interventions may inform the design of the public realm and urban policy moving forward.



Artist Kuki Go led the community-engaged design and creation of a block-long tape mural at the Avenue B Open Street in Manhattan in 2021.

This publication is intended to serve as a source of inspiration for designers, planners, policymakers, community groups, and individuals advocating for the use and design of their streets. The case studies suggest ways in which streets can be reimagined to enhance public health with accompanying data that underscores the need to design and build high-quality public spaces to address inequities across New York City.

This publication is not a comprehensive how-to guide, a policy document, or a reference manual on street design, NYC DOT's Vision Zero program, or public health. For access to this type of information, see the resources listed in the Appendix. Further, this is not a one-size-fits-all guide. Solutions that may work for certain sites and neighborhoods may not be effective in others. This publication focuses primarily on streetscapes within dense urban contexts and does not have the space or resources to delve into many of the issues facing streets on a broader suburban or rural scale. Moreover, many pressing topics that affect New York City's streetscapes are not addressed in detail within this text, such as sanitation and maintenance, e-commerce, homelessness, and the opioid epidemic.

“NYC Planning is committed to working with diverse communities to plan healthy and safe streetscapes that encourage biking, eating, and shopping, enlivening the city and supporting the well-being of all 8.5 million New Yorkers.”

— Dan Garodnick, Director and Commission Chair, NYC Department of City Planning



▲ An adaptive basketball game within a New York City street closed to vehicular traffic promotes physical wellness through activity and play inclusive of people of all ages and abilities.

▶ Free group fitness classes at a plaza space beneath an overpass at 125th Street in East Harlem, New York provide a joyful outlet and an opportunity to improve mental well-being and a sense of belonging.



Wellness Redefined

Merriam-Webster defines wellness as “the quality or state of being in good health especially as an actively sought goal.”¹¹ Wellness is often associated with individual actions, lifestyle choices, and personal growth that can be achieved with the help of a product or service. This commodified focus can be limiting and inequitable. The following definitions represent four urban design-informed lenses of health that constitute a broader, holistic concept of wellness. These lenses highlight how the health of individuals, communities, and ecosystems can be improved through the design of public spaces.

Physical Health

A person’s baseline physical health is measured by the absence of illness and injury, and a healthy diet and exercise may help obtain optimal health. Taking into consideration a broad range of abilities, as well as systemic inequities that may create barriers to achieving optimal health, public design can enhance physical health by...

- promoting bodily well-being, active transit, walkability, physical activity, and play for people of all ages and abilities.
- encouraging and facilitating movement, rest, and exercise.
- providing comfort and safety for pedestrians, bicyclists, and people using other micromobility devices for transportation.
- incorporating accessibility for a variety of users, including people with varying abilities, neurodiverse populations, and people of all ages, races, and gender expressions.

Mental Health

Mental health is a multi-dimensional concept that encompasses a person’s “optimal experience and functioning”¹² and integrates a sense of individual happiness and purpose with the ability to foster meaningful relationships with others.¹³ The design of streetscapes can enhance mental health by...

- providing moments of joy, inspiration, respite, and healing.
- offering a diversity of sensory needs.
- mitigating noise pollution or chaotic visual stimuli.
- improving feelings of safety through better lighting, human-scale design, and the presence of active street life.
- allowing access to green spaces and nature to support psychological well-being and alleviate symptoms of serious mental illnesses.¹⁴
- providing a sense of belonging.

Research has shown that people living in cities are at higher risk of experiencing serious mental health issues, including anxiety, depression, and post-traumatic stress disorder. This is likely a result of social and environmental factors and stressors, such as isolation, poverty, over-crowding, sensory overload, and a lack of protective services or sufficient mental health infrastructure.¹⁵

Community Health

Community health refers to the combined well-being of all people in a place. It is related to public health, but on a localized level and with an emphasis on empowering communities. Designers can cultivate community health by...

- recognizing community health needs and encouraging a sense of stewardship.
- bringing people together and fostering social cohesion.
- allowing for community engagement and input within planning, design, programming, and maintenance processes.
- honoring local knowledge and community ownership of public realm projects.
- welcoming all members of a community and designing for inclusivity.

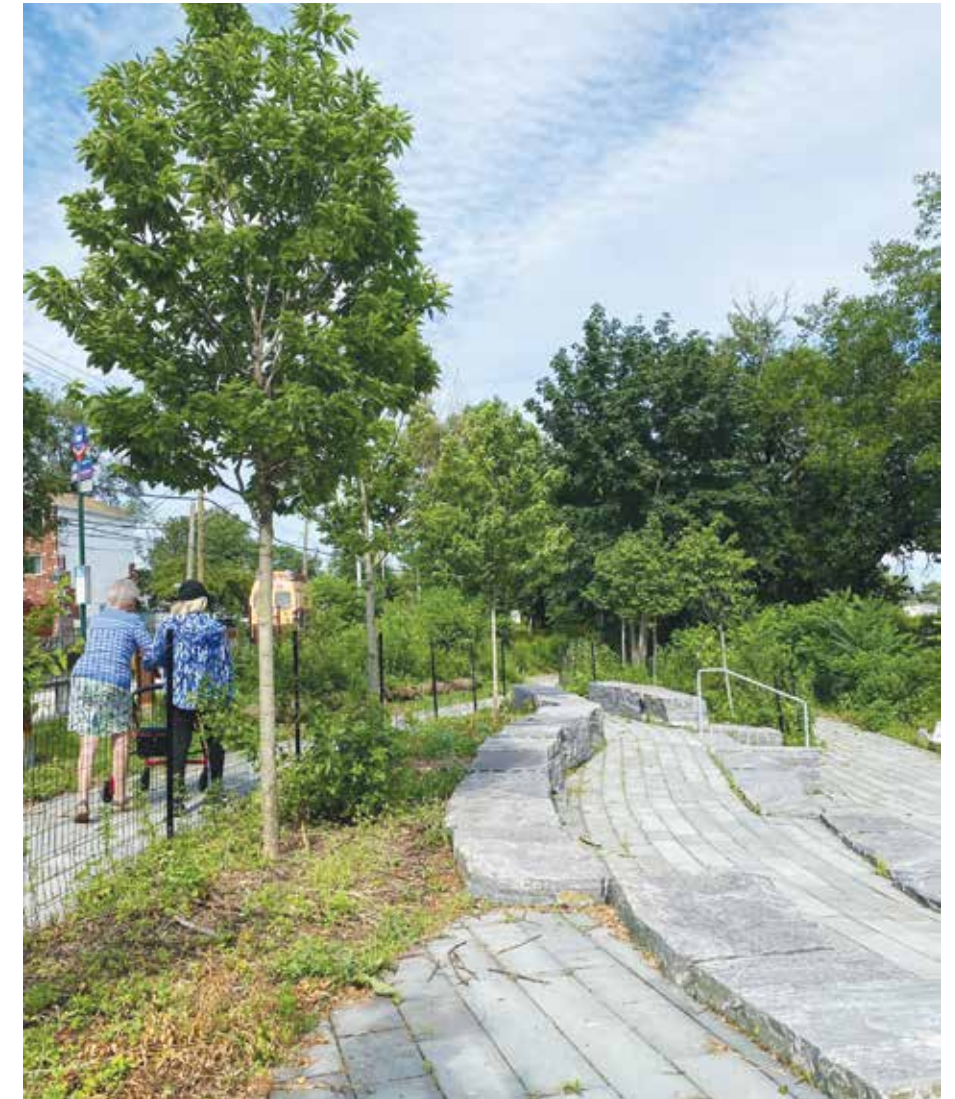
Environmental Health

Environmental health encompasses all aspects of the built and natural environment that affect public health. As global temperatures rise, and as natural disasters increase in frequency and intensity, cities worldwide will need to adapt to face these challenges. Urban designers can address these issues by...

- incorporating street trees and greening to aid in cooling the microclimate and preventing urban heat island effect.
- prioritizing lower-emission car-alternative transit, including active transportation, public transportation, electric vehicles, and micro-mobility options.
- utilizing water-tolerant plants, permeable materials, and strategic designs that mitigate flooding.
- sourcing recycled and local materials.



- ▶ Prioritizing native plantings, permeable paving, accessible pedestrian paths, and public transportation improves climate resilience and ecological health, such as at Richmond Terrace in Staten Island, New York.
- ◀ Community-organized public events, including The Soapbox Presents' "Stoop Sessions" concerts that originated in Harlem, New York during the 2020 pandemic lockdown, bring neighbors together to allow space for healing and to celebrate and build community.



“Vibrant streetscapes designed to meet the needs of NYC’s diverse neighborhoods support the physical, mental and social health of communities and keep us connected to our cultures, and to each other.”

— Dr. Ashwin Vasan, Commissioner, NYC Department of Health and Mental Hygiene

Whose Wellness Are We Talking About?

Do streetscape design strategies implemented during the pandemic serve all communities equitably? How are the needs of essential workers, small businesses, or street vendors considered in the designation of pedestrianized areas, bus-priority corridors, or loading zones? Does the design of our streets account for ever-expanding modes of micro-mobility or new technologies? Or perhaps consider the ways in which people already use a space? How are our streets adaptable to an ever-changing climate, where disparities in vulnerabilities also tend to fall along racial and economic lines? Do individuals feel empowered to shape their streets?

Our streets are public amenities with the capacity to do more and be more. In considering the future of our streetscapes, it is important to meet people where they are and understand the complexities of needs within their communities. Though some neighborhoods have reaped the benefits of certain public realm interventions and programs that aimed to reclaim the streets for pedestrian use and public health benefit, the same solutions may not work for other communities. A one-size-fits-all solution lacking in flexibility is rarely a solution for all. *Streetscapes for Wellness* are multifaceted, and the needs of our city's most vulnerable and often least-represented populations must be considered in the design and planning of our streets. Equity must be a fundamental driver of wellness.

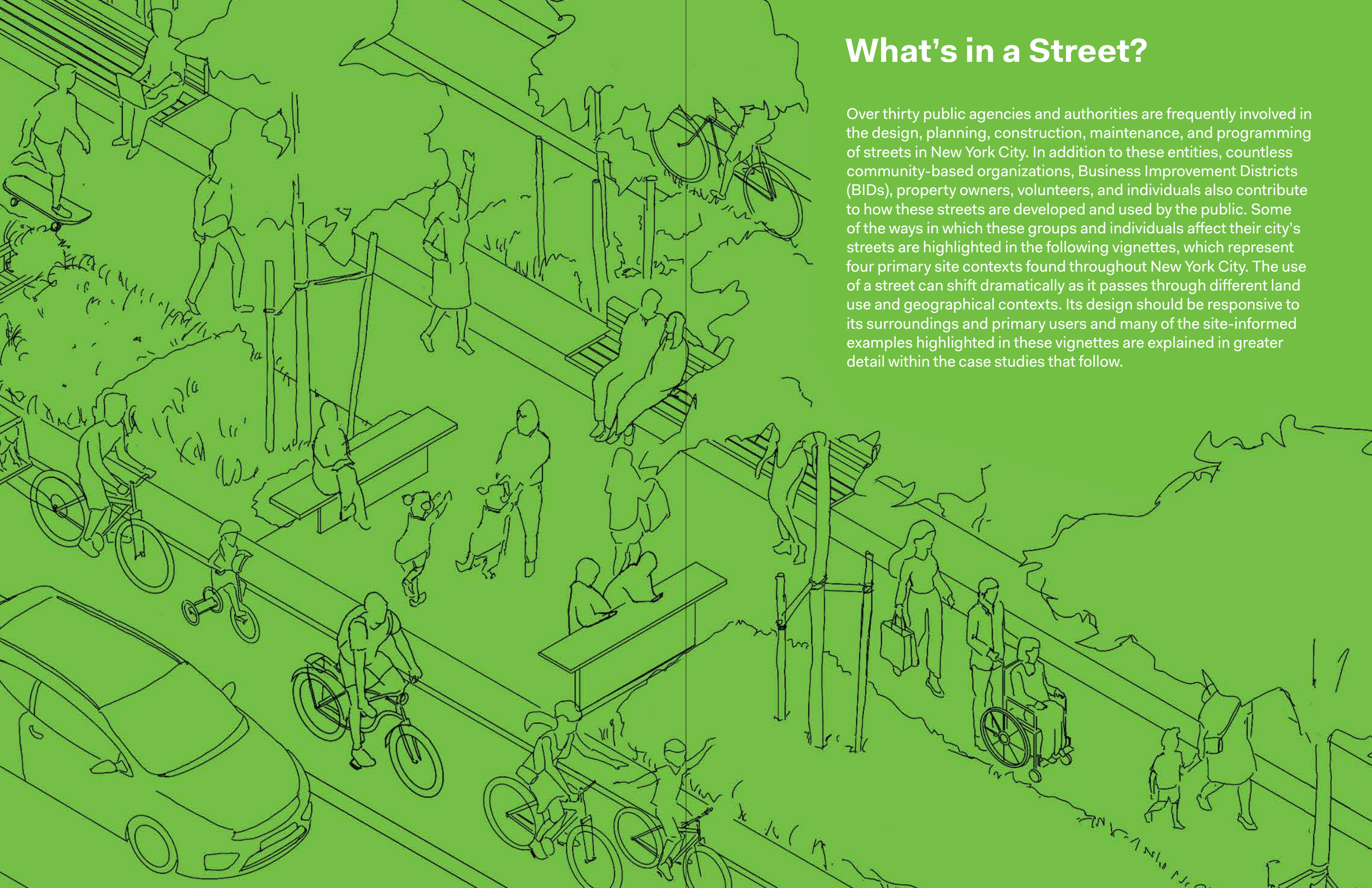


- ▲ The sidewalks in Jackson Heights, Queens, New York are densely packed with informal uses, including street vending and COVID-19 testing.
- ▶ In the absence of benches, tree guards are informally used as seating near Dunningham Triangle in Elmhurst, Queens, New York.

“A redesigned street will not feel like it’s contributing to community wellness if it requires displacement of unhoused neighbors, complex permitting, finding funding for roadblocks, potential harm to small businesses, or worse, the risk of related legal enforcement.”

— Deborah Marton, Commissioner, NYC Public Design Commission;
Executive Director, Van Alen Institute





What's in a Street?

Over thirty public agencies and authorities are frequently involved in the design, planning, construction, maintenance, and programming of streets in New York City. In addition to these entities, countless community-based organizations, Business Improvement Districts (BIDs), property owners, volunteers, and individuals also contribute to how these streets are developed and used by the public. Some of the ways in which these groups and individuals affect their city's streets are highlighted in the following vignettes, which represent four primary site contexts found throughout New York City. The use of a street can shift dramatically as it passes through different land use and geographical contexts. Its design should be responsive to its surroundings and primary users and many of the site-informed examples highlighted in these vignettes are explained in greater detail within the case studies that follow.

Residential

A corridor that passes through a residential area should consider the needs of the people who live nearby. Does this corridor provide space for socializing, play, and recreation? Or perhaps a quiet space of respite? Or a mix and balance of the two? How does it support local small businesses, allow for local deliveries, or make it safer for students to get to and from school?

Simple design interventions, such as painted or chalked pavement games, can prioritize spaces for young people to play and create close to home.
See: Design for Play, p. 56

A street eatery allows a restaurant to occupy part of the sidewalk or roadbed for dining service.
See: NYC Open Streets, p. 38

A design team roots its work within the neighborhood, directly interacting with and supporting the community.
See: Neighborhoods Now, p. 50

A shaded street with water, fans, and seating can act as a temporary cooling station during heat waves.
See: The Refreshing Waters, p. 45

Planting trees and plants can restore environmental quality and mitigate the consequences of environmental racism.
See: Clean Air Green Corridor, p. 64

Modular furniture with pop-up educational programming allows for learning and exploration in any street.
See: Street Lab Pop-up Programs, p. 46

Did you know...

- that any NYC property owner can submit a request to NYC Parks and apply to have a tree planted on their street for free?
NYC Parks' planting contractors will care for the tree for the first two years after planting.
- that local NYC residents are encouraged to help care for street trees?
Volunteers can water and mulch the trees, plant flowers in the tree beds, and donate to NYC Parks Tree Time to have a tree guard installed.
- that catch basins are a critical part of NYC's flood prevention infrastructure that is managed by the NYC Department of Environmental Protection (NYC DEP)?
As flooding from climate change becomes an increasing challenge, anyone can help to protect their street from flooding by clearing catch basins of leaves and debris or by reporting a maintenance issue to 311.
- that NYC DEP and the Fire Department of New York (FDNY) install spray caps onto fire hydrants in NYC's most heat-burdened neighborhoods during heat advisories?
To find a Cool Street near you this summer, visit the Cool It! NYC map.

Commercial

A broad boulevard or a transit corridor that passes through a commercial district should consider a diversity of active uses and users throughout the day, including residents and commuters, local, regional, and even international visitors. Are there multiple, efficient forms of transit access with universal design? Is wayfinding legible? How are loading zones and congestion addressed, and how do they intersect with pedestrians or bicyclists? Can the amount of paved area used for cars be reduced? Do cyclists have designated lanes where they are protected from traffic? What is the feel and experience of walking on the sidewalk, and are comfort and accessibility maximized?

Installations within public open spaces can encourage community interaction or provide a temporary respite.
See: Healing Spaces, p. 58

Planted medians with modified traffic circulation and accessible pedestrian crossings improve safety and quality of life.
See: Grand Concourse Reconstruction, p. 100

The roadway can be reclaimed as public space or designated pedestrian space through social or political artwork.
See: BLM Mural, p. 70

Prioritizing bus traffic and limiting other through-traffic can result in increased bus speeds, reliability, and ridership.
See: 14th Street Busway, p. 106

Establishing designated, protected bike lanes with landscaped medians and clear traffic patterns improves cyclist safety.
See: Tillary Street Reconstruction, p. 110

Designing for a variety of occupancy intentions and flexibility can foster the coexistence of diverse populations.
See: Restorative Ground, p. 60

Did you know...

- that NYC DOT partners with artists to paint murals onto asphalt that has been transformed into pedestrianized public spaces, such as this curb extension?

Interested professional artists or designers may access information about the Asphalt Art Activations qualification process on NYC DOT's Art Program website.

- that NYC Planning has overseen the Privately Owned Public Space (POPS) Program since its inception in 1961?

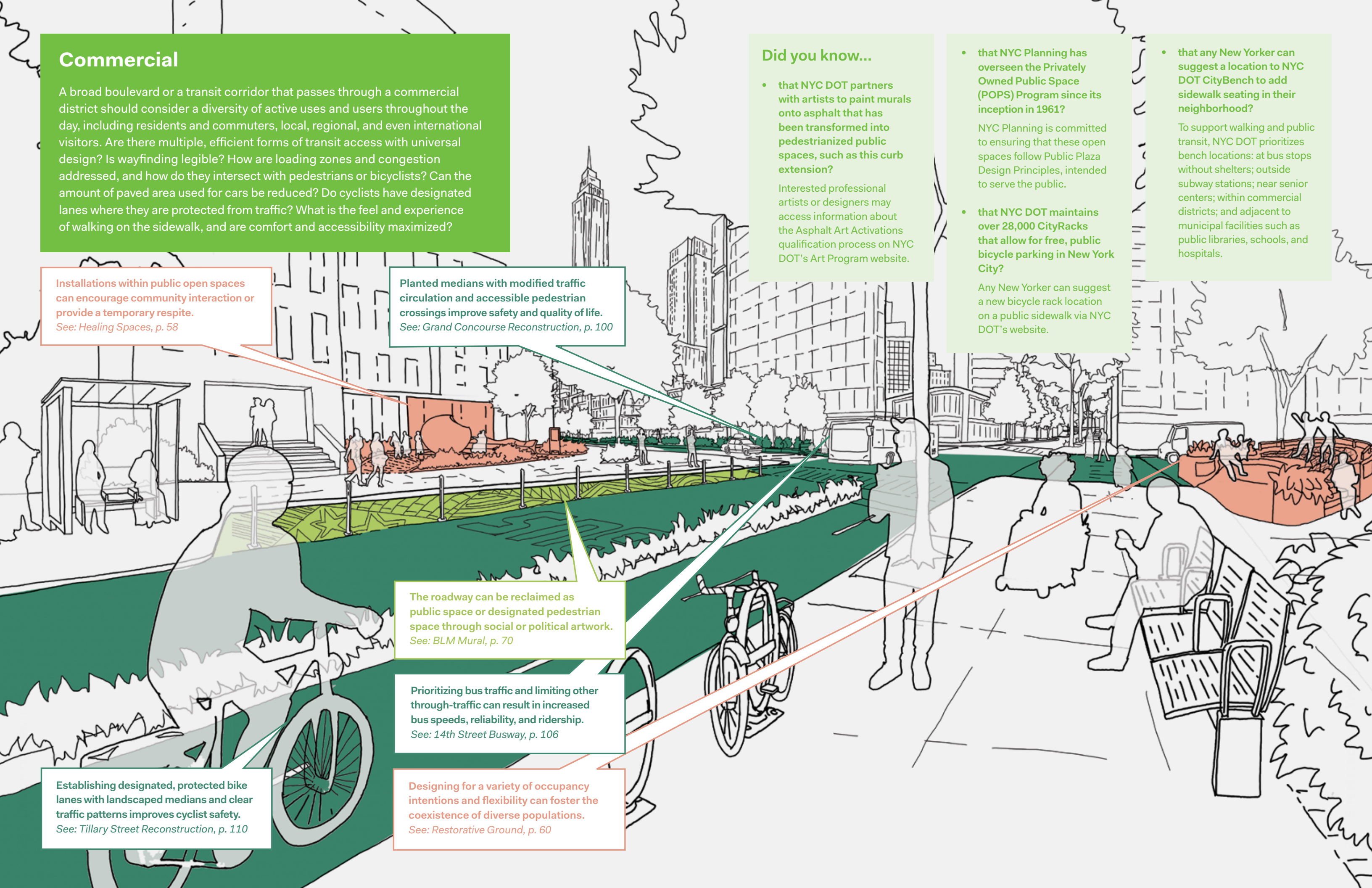
NYC Planning is committed to ensuring that these open spaces follow Public Plaza Design Principles, intended to serve the public.

- that NYC DOT maintains over 28,000 CityRacks that allow for free, public bicycle parking in New York City?

Any New Yorker can suggest a new bicycle rack location on a public sidewalk via NYC DOT's website.

- that any New Yorker can suggest a location to NYC DOT CityBench to add sidewalk seating in their neighborhood?

To support walking and public transit, NYC DOT prioritizes bench locations: at bus stops without shelters; outside subway stations; near senior centers; within commercial districts; and adjacent to municipal facilities such as public libraries, schools, and hospitals.



Industrial

A corridor that passes beneath elevated infrastructure or through an industrial area should be reimaged as more active and attractive assets for the local community. How can greening be increased to slow stormwater runoff and flooding? How can neighborhoods that were physically bifurcated by elevated infrastructure be reconnected? Can forgotten spaces be reactivated and serve new purposes?

A painted asphalt mural and wellness-centered programming activate the roadbed under elevated infrastructure.

See: *Rockaway Wellness Way*, p. 94

Diverting stormwater runoff from overpasses into bioretention planters mitigates flooding and greens the street.

See: *El-Space Pilots*, p. 88

Artist-designed lighting installations creatively illuminate a previously dark pedestrian pathway.

See: *Silent Lights*, p. 96

Community-organized food pantries, fridges, and distribution sites utilize the street as a site to improve food access.

See: *Community Food Access*, p. 73

Removing fences and adding paths, planting, and seating can transform underused spaces into public amenities.

See: *Hugh J. Grant Circle*, p. 84

Did you know...

- that NYC DOT has been working to improve the safety of pedestrian crossings as part of its Vision Zero initiative?

Its traffic and turn calming strategies include pedestrian refuge islands, raised crosswalks, speed bumps, and flexible delineator posts.

- that NYC DEP manages the NYC Green Infrastructure Plan, which includes rain gardens?

These planted areas allow rain to be absorbed into the ground instead of flowing into the sewer system, reducing ponding, providing shade, and greening the streetscape.

Open Space Adjacent

A corridor that runs along parks, plazas, open spaces, or waterfronts should be designed to take advantage of this proximity. How can barriers be reduced and sight lines improved to welcome more people into these spaces? Can vegetation be added to make the streetscape greener? And can public amenities, such as benches and bike racks, be added along the sidewalk, more seamlessly integrating the adjacent open space into the neighborhood?

Connecting the streetscape to the waterfront through accessible paths and piers allows pedestrians to immerse themselves in nature.

See: *Richmond Terrace Wetlands*, p. 80

Vibrant community-created murals brighten the streetscape and infuse the neighborhood with civic pride.

See: *Grandscale Mural Project*, p. 72

Foster coexistence in planning processes by engaging with all people who use public spaces, including those who are experiencing homelessness.

See: *Coexistence Toolkit*, p. 71

Wide, accessible, and continuous landscaped bike and pedestrian paths can connect people to parks and encourage active recreation.

See: *Brooklyn Waterfront Greenway*, p. 108

Terraced seating and native plantings near a park entry add public amenities that draw passersby into the green space.

See: *Prospect Park Perimeter*, p. 82

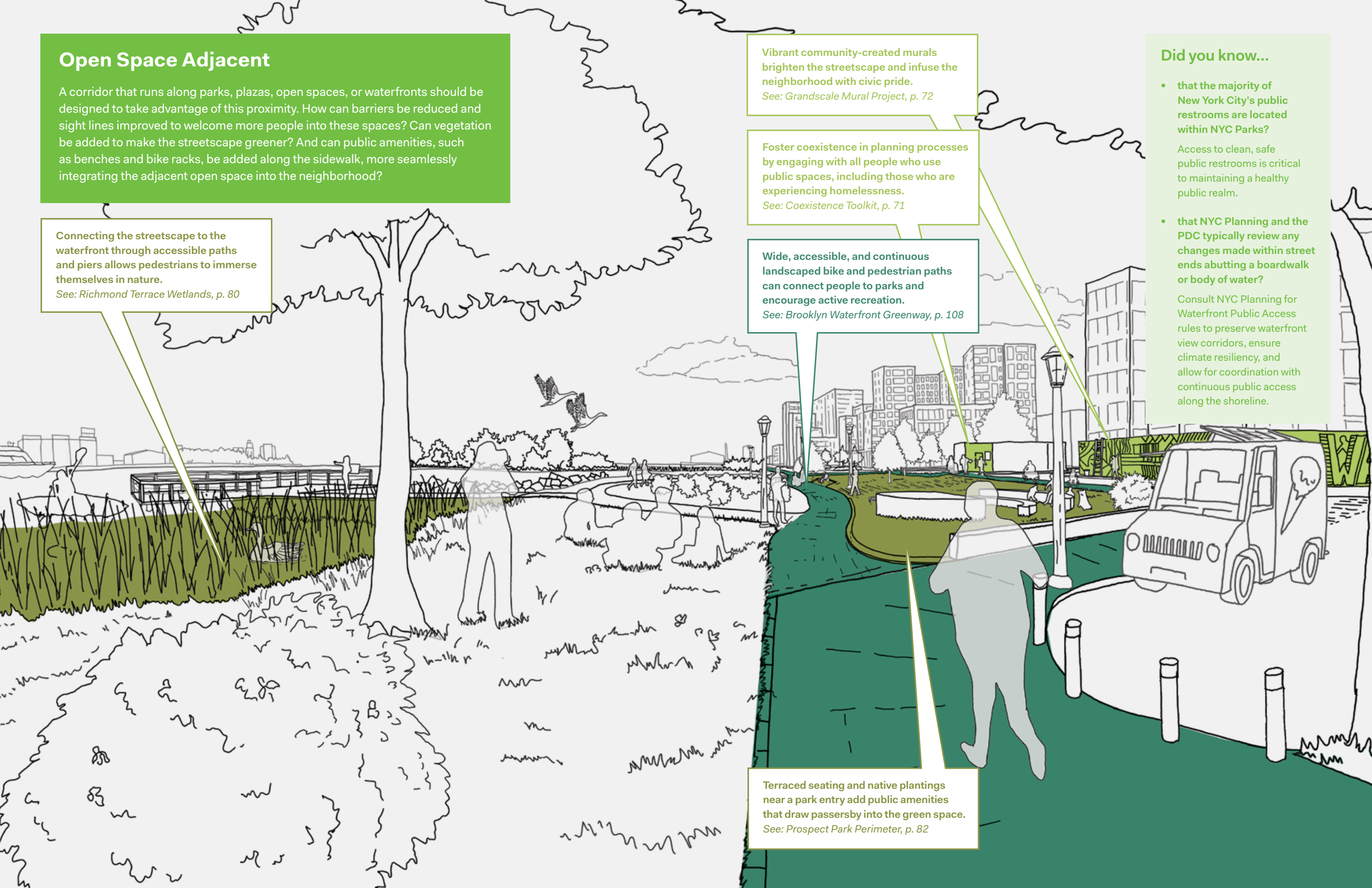
Did you know...

- that the majority of New York City's public restrooms are located within NYC Parks?

Access to clean, safe public restrooms is critical to maintaining a healthy public realm.

- that NYC Planning and the PDC typically review any changes made within street ends abutting a boardwalk or body of water?

Consult NYC Planning for Waterfront Public Access rules to preserve waterfront view corridors, ensure climate resiliency, and allow for coordination with continuous public access along the shoreline.



Case Studies

The following case studies represent a variety of projects that range in scale and typology, from temporary programmatic interventions to capital constructions. While most of these projects are located within New York City, a couple from other cities have been included as references to balance out local categories.

These projects were informed and envisioned by community members, working collaboratively with nonprofit organizations, artists, designers, and City agencies. Some were spurred from a pressing need to provide relief, recreation, and social interactions during a pandemic. Others are the result of years of careful planning. They highlight creative approaches to challenging sites, diverse needs, and regulations.

The majority of the projects listed are temporary in nature. While the PDC has purview over permanent designs of City-owned streets, short-term installations can act as proving grounds and inspiration for future capital projects. The PDC is uniquely situated to help synthesize and guide how these interventions may inform future designs of the public realm and urban policy.

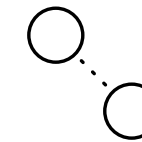
A Guide to the Case Studies

Each chapter includes a primary case study that is sited in New York City and features a chart of “Key Facts” and “Takeaways” related to the project. Community health data for each of these primary case study neighborhoods is also featured within the Appendix to highlight the context of these sites in relation to broader demographics and public health data.

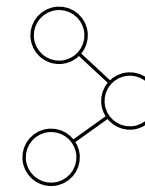
Every case study also includes information about the project type, represented by an icon that indicates its scale and level of permanence:



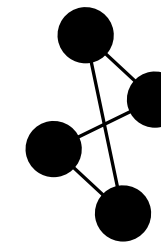
No physical intervention, programming only
Examples: toolkits, ephemeral activations



Minimal or temporary physical intervention
Examples: mobile installations, temporary road closures



Moderate physical intervention
Examples: public art installations, permanent road closures



Significant physical intervention
Examples: construction of structures, plazas, full street reconstructions

The case studies highlighted embody all or most of the four lenses of wellness described earlier in the publication and are organized into six chapters:

Open Streets

Temporary transformations of streetscapes from vehicular corridors to pedestrianized public spaces that allow for learning, cooling, commerce, and play

Collaborative Recovery

Community-based engagement sessions and streetscape interventions that encourage neighborhood stewardship, social adhesion, and healing

Streets for Justice

A reimagining of streetscapes as public spaces to advance equity through social engagement, advocacy, art, and expression

Parks, Plazas, and Peripheries

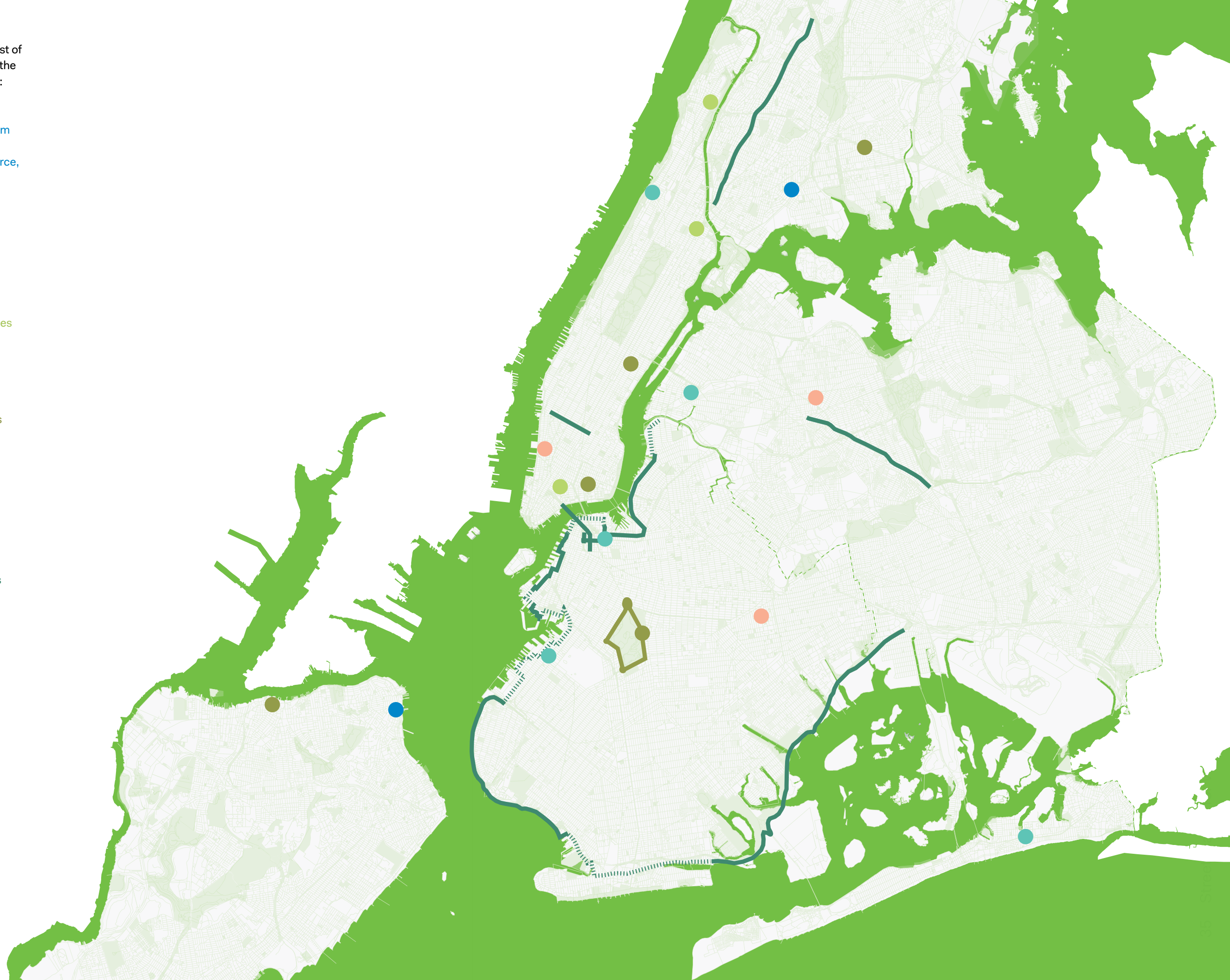
Streets as extensions of green spaces that foster respite within dense urban environments and improve ecological sustainability and climate resiliency

Under the Elevated

A reclaiming of “forgotten” spaces beneath elevated infrastructure through public programming, care, art, and activation

Sharing the Street

Public space management that gives roadways back to pedestrians, cyclists, public transit, green infrastructure, and artworks



1

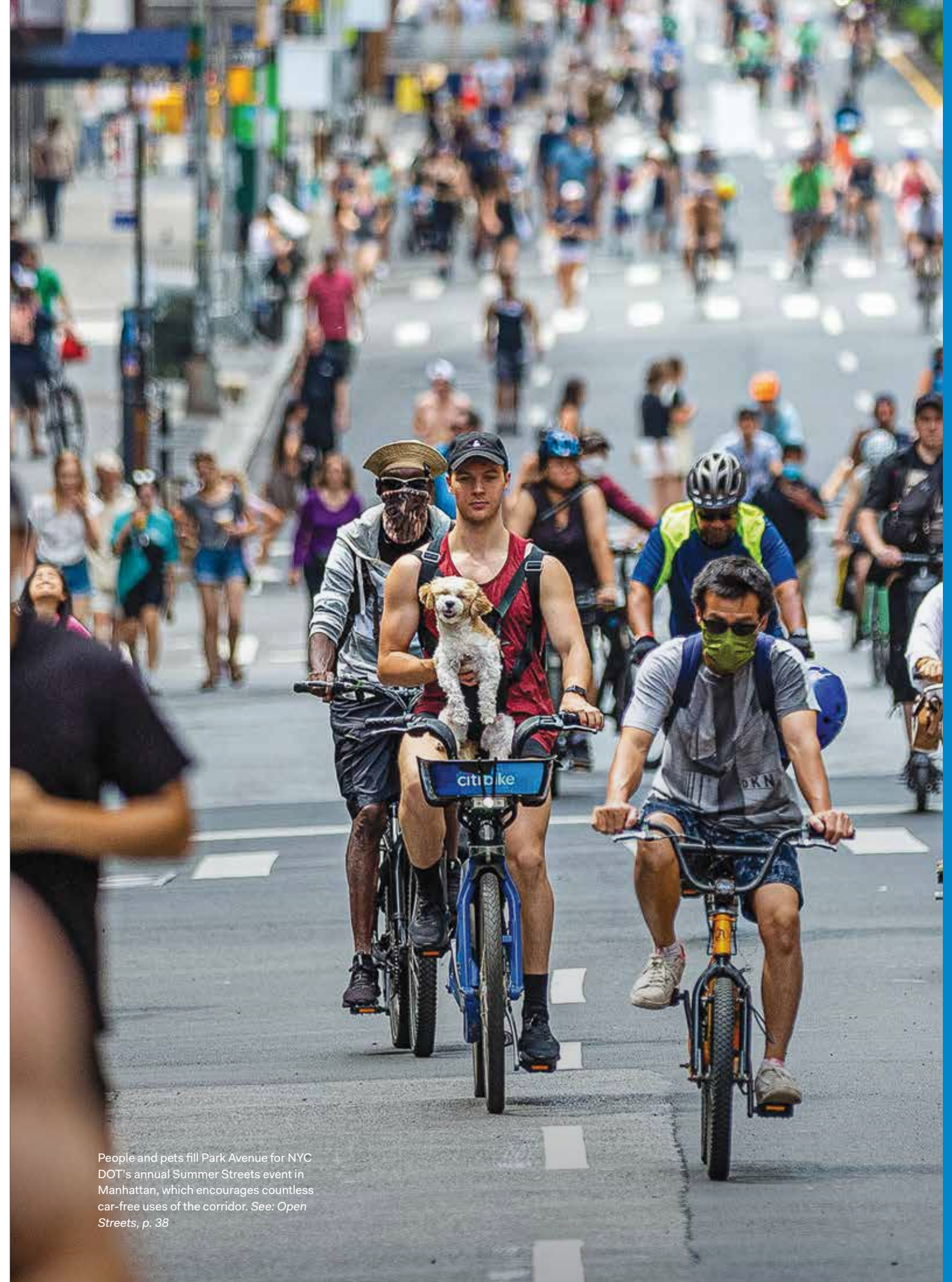


Open Streets

Repurposing roadways for recreation and community uses has a long history in New York City and other urban areas. In 1914, New York began experimenting with closing streets to traffic for the enjoyment and health of people with the NYC Play Streets program. In Bogotá, Colombia, the Ciclovía (bikeway) experiment has transformed streets into spaces exclusively for pedestrians and cyclists every Sunday since 1974—and become a rousing inspiration for today’s open streets movement.¹⁶ Recently, open streets programs have gained popularity worldwide, activating streetscapes to provide open spaces for recreation, reduce pollution, and encourage alternate modes of mobility and active transportation. In 2008, NYC DOT launched its Summer Streets program, closing Park Avenue from Brooklyn Bridge to Central Park to traffic on Saturdays in August. Nearly 300,000 people enjoyed the temporary, seven-mile car-free corridor in 2019, and this annual event, which has since expanded northward to East Harlem, has inspired New Yorkers to envision the street in new ways.

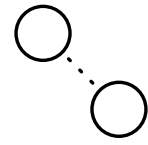
With the arrival of a global pandemic in early 2020, NYC DOT initiated the Open Streets program to provide safe environments for New Yorkers to get outside, exercise, and socialize. Through partnerships between City agencies and community-based organizations, Open Streets in New York City have been utilized as outdoor classrooms and play spaces for young people, as cooling areas and gathering spaces for elderly and vulnerable populations, and as a tool for economic recovery, providing a lifeline to businesses struggling during the pandemic. The open streets typology is flexible and adaptable to a variety of community needs but requires the ongoing stewardship, programming, and advocacy of local stakeholders. With simple design interventions, targeted programming, and activations, these programs transform streetscapes from car-oriented corridors into places for people.

As cities look to expand the reach of similar pedestrianization initiatives, how will the specific needs of—and resources available to—residents be considered? And, how can these corridors provide both connectivity and respite within a broader urban network?



People and pets fill Park Avenue for NYC DOT’s annual Summer Streets event in Manhattan, which encourages countless car-free uses of the corridor. See: *Open Streets*, p. 38

NYC Open Streets



Team: NYC Department of Transportation

Location: New York City, New York

Year: 2020–ongoing

Project Type: Temporary street closures

In the spring of 2020, NYC DOT launched the Open Streets program as a way of utilizing city streets to provide people with more outdoor space for socially distanced recreation during the COVID-19 pandemic. Operated through an application process, this program allows local community organizations to take ownership of the maintenance and activation of an approved Open Street. As of 2022, this ambitious program has transformed streets across all five boroughs into public spaces, supporting small businesses, schools, and community-based organizations.

Early in the program, NYC DOT indicated specific street segments throughout the city that had the potential to be promising Open Street pilot locations. In addition to these City-designated sites, the program allowed members of the public, elected officials, and community boards to apply for their own Open Street. NYC DOT works with partners and local stakeholders to ensure loading, deliveries, and emergency access are coordinated as part of the Open Streets' operations.

The quick implementation of Open Streets demonstrated that New York City's streets could swiftly be transformed for a variety of non-vehicular uses. Later in 2020, the concept was expanded further with the Open Restaurants and Open Storefronts programs, which provide a financial lifeline to restaurants and retailers by allowing them to utilize the street for expanded outdoor dining and commercial activity.

The success of an Open Street is largely dependent upon the buy-in from local stakeholders. New York City's longest continuous Open Street, 34th Avenue in Jackson Heights, Queens, is 1.3-miles-long and passes through a residential neighborhood. Though the corridor has been well-used and maintained and is programmed by the 34th Ave. Open Streets Coalition, a newly formed community-based organization of devoted volunteers, it has also been met with resistance and local requests for operational adjustments. In response, the Coalition has worked to outfit barricades with clear directional signage and tennis ball feet, a low-cost fix that has made it easier for an individual to smoothly and quietly slide a barricade out of position to allow for local vehicular access.

And on Staten Island, which has the highest percentage of car owners per capita in New York City, enthusiastic local support has helped make Open Streets a promising public-space model. For example, local stakeholders have come to embrace the Minthorne Street corridor's Full Closure from Bay Street to Victory Boulevard on weekends. Supported by a partnership between a local developer and community organizations, the street had not previously served as a major vehicular thoroughfare, and it has readily been remade as a popular community gathering and outdoor dining space.

As the Open Streets program transitions to a permanent feature within New York City,



▲ Pedestrians and diners enjoy the Open Street and interim Open Restaurants street eateries at East 4th Street in Manhattan.

it will be crucial to offer equitable support across communities that may not have the immediate resources to establish their own high-quality public spaces. New York City's current strategy for managing these public corridors builds upon a public-private partnership model, reliant upon local stakeholders or community-based organizations to plan, program, and maintain their spaces.

Because the funding of these groups varies significantly across the city, and many neighborhoods do not have a BID or local nonprofit organization with the resources to support these amenities, this has resulted in quality disparities between different corridors throughout the five boroughs. Aiming to rectify a similar disparity within New York City's plaza spaces, NYC DOT worked closely with The Horticultural Society of New York to provide regular operational, horticultural, and sanitation support on select Open Streets across the city,

especially those that were formally managed by low-capacity partners.

Throughout the pandemic, the Open Streets program allowed New Yorkers to be physically active and connect with others while maintaining a safe social distance. Through the reclaiming of public space for activity, respite, and gathering, as well as communal advocacy and maintenance efforts along corridors, New Yorkers have had novel opportunities to meet and interact with their neighbors. Open Streets allow the promising potential to support schools, promote economic development, and add open recreation space where anyone can play, relax, and socialize. The many creative examples of Open Streets to date have affirmed that these reprogrammed public spaces can support community wellness, contribute to a healthier environment through the reduction of automobile emissions, and provide a range of additional urban benefits that positively impact neighborhoods.



- ▲ Movable barricades and signs delineate vehicular circulation from on-street dining and recreation spaces along the Columbus Avenue Open Street in the Upper West Side, Manhattan.



- ▲ The Urban Yoga Foundation hosts a Sunday Wellness yoga session at the Marcus Meets Malcolm Open Street on West 120th Street in Harlem.
- ▶ Open Streets create safe spaces for young children and families, allowing opportunities for exploratory play and cycling practice.



“Through innovative designs and programs like Open Streets, NYC DOT is showing how we can reimagine our roads for better, alternative uses, contributing to public health and overall wellness for all New Yorkers.”

— Ydanis Rodriguez, Commissioner, NYC Department of Transportation

“All schools need safe space around their schools, not just in their schools.”

— Alice Goodman, Senior Director of Policy & Partnerships, Office of School Wellness Programs, NYC Department of Education



- ▲ In 2021, a community tape mural by Artist Kuki Go activated the Avenue B Open Street in Manhattan, alongside a popular park and playground.
- ▼ The mural and movable street furnishings encouraged Tompkins Square Park’s passive recreation spaces to overflow into the roadway.
- ▼ The 1.3-mile-long 34th Avenue Open Street in Jackson Heights, Queens runs past several schools, which have taken advantage of the corridor for safer commutes, recess hours, and events.



- ▲ To celebrate a car-free and arts-filled Earth Day, community members of all ages gathered at West 103rd Street to paint, hula hoop, and enjoy live music in the street with neighbors.

Key Facts

80% of New York City's open spaces comprise streets.

34th Avenue in Jackson Heights is New York City's longest continuous Open Street.

A Full Closure: Schools permit supports safer drop-off/pick-up operations by NYC schools and allows streets to be used for outdoor learning and recess.

The NYC Open Streets emergency response initiative transitioned to a permanent program after being signed into law by Mayor de Blasio in Spring 2021.

Takeaways

When communities advocate for their own street programs, stewardship and community coalitions can form.

There is potential for improvement in the design of barriers for closing Open Streets to traffic.

Open Streets require collaboration and compromise among community members to balance shared use and neighborhood priorities.

Open Streets allow for the transformation of streets into public spaces that allow for a range of activities and programming opportunities.

NYC Play Streets

Team: NYC Department of Health and Mental Hygiene, NYC Department of Transportation, NYC Department of Parks & Recreation, Police Athletic League (founding agency)

Location: New York City, New York

Year: 1914–2020

Project Type: Temporary street closures

In the summer of 1914, New York City Police Commissioner Arthur Woods introduced the Play Street Experiment by prohibiting traffic along a stretch of Eldridge Street between Rivington Street and Delancey Street. NYC Parks outfitted the original Play Street with two Street Pianos, allowing anyone to play, and an adjacent housing organization hosted folk-dancing. Designed to bring outdoor play spaces to lower income communities that lacked parks, these play streets were very

popular within these neighborhoods and the project soon expanded to all five New York City boroughs. During the COVID-19 pandemic, the formal management of the Play Streets program shifted to being hosted within NYC Open Streets. Today, City agencies continue to support the use of streets for play and to provide more opportunities for physical activity for children, and more recently, as sites for outdoor learning.



▲ Robert M. Morgenthau, former president of the Police Athletic League, jumps rope with children on a NYC Play Street in July 1981.

▶ Local seniors, many of whom lack air conditioning at home, gather to socialize and beat the heat at this temporary cooling station.



The Refreshing Waters

Team: NYC Department of Health and Mental Hygiene, Southeast Bronx Community Organization (SEBCO), THE POINT Community Development Corporation, and Interboro Partners

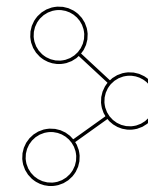
Location: Tiffany Street Between Southern Boulevard and Bruckner Boulevard, Bronx, New York City, New York

Year: 2020–ongoing

Project Type: Small-scale local intervention

In the summer of 2020, many indoor public spaces were closed due to concerns over community spread of COVID-19. This included indoor cooling centers, which provide air-conditioned environments during periods of extreme heat and serve as a preventative measure against heat stress and illness. In response, the New York City Department of Health and Mental Hygiene (DOHMH) partnered with the design firm Interboro Partners and the Southeast Bronx Community Organization (SEBCO) to develop The Refreshing Waters, a temporary outdoor cooling station on a pedestrianized section of Tiffany Street in the South Bronx. This street serves as a gathering space and is regularly used by older adults, a population that is at higher risk of heat-related illness. The Refreshing Waters adds

a cooling element to a community space and incorporates a misting line, fans, and seating with markers for social distancing along an existing fence—all painted in a cheerful and recognizable blue. The project was re-installed in the summer of 2021 in partnership with an additional community-based organization, THE POINT Community Development Corporation, which provided programming through its Be a Buddy volunteers. Such programming included open mic events, the installation of movable furnishings, and educational outreach about neighborhood resources available during extreme heat events. The project demonstrates how streets can serve as a crucial community health resource while reinforcing neighborhood cohesion.



Street Lab Pop-up Programs

Team: Street Lab

Location: New York City, New York

Year: 2011–ongoing

Project Type: Mobile small-scale structures and pop-up events

Established in 2011, nonprofit organization Street Lab creates and shares pop-up programs in support of local community groups, bringing movable reading rooms and other programming environments to outdoor public spaces throughout New York City. In partnership with local advocates and City agencies, Street Lab's pop-up programs transform streets, plazas, and playgrounds into libraries, classrooms, and art studios. Their modular reading room carts are designed to roll into the street and unfold into sculptural shelves filled with books, puzzles, and art supplies, encouraging

self-guided exploration and neighborhood cohesion. To support pandemic recovery efforts and provide safe, uplifting outdoor programming for young people and adults, Street Lab launched a new program called PLAY NYC in 2020, featuring a "no touch obstacle course," and focused its 2021 public space activations in the 33 New York City communities hardest hit by the pandemic. It also launched Street Lab Teens in 2021, which invites high school students to develop and lead outdoor artmaking and engagement projects.



▲ Street Lab's Uni Cart transports activities and books, encouraging self-guided exploration in public spaces.



- ▲ Lightweight, modular Uni Benches and rolling, foldable Uni Carts are part of Street Lab's programming kits, which can be deployed to create a pop-up reading room nearly anywhere.
- ▶ Street Lab Teens encourage community members to draw together during the pandemic, creating brightly colored communal murals.



“Street Lab Teens positively affects NYC by bringing families and a community together. It was great we could do this, even with a pandemic. Seeing people together definitely helped me.”

—Anaya B., Street Lab Teens Program Participant 2021



Collaborative Recovery

The COVID-19 pandemic spurred the creation of community networks that helped neighbors and businesses survive the new health-related restrictions requiring social distancing. As communities and small businesses faced hardships and losses, longstanding inequities were further exacerbated and brought to light. Faced with imminent challenges and severe emotional trauma, people banded together to engage their communities and strategize tactical solutions in support of equitable wellness. The need for immediate action also provided an opportunity for experimentation in the public realm and a chance to program streetscapes with innovative pilot projects that aimed to combat the erosion of economic stability and support the physical and mental health of communities.

While many neighborhood groups were able to quickly respond to and benefit from the City's open streets programs, others were challenged by limited resources and barriers such as language. To support stakeholders that have historically been underserved by the professional design community, designers and planners partnered with youth leaders, community-based organizations, urban design think tanks, and BIDs, among others, to brainstorm and respond to rapidly shifting obstacles, policies, and parameters. Together, they implemented collective design and planning strategies, garnering diverse stakeholder involvement, and encouraging individualized innovation. How can the collaborative activation of our streets foster community adhesion to improve local equity and aid recovery amid a period of crisis?



Youth in Brownsville, Brooklyn, punch the façade of the "Release Room" community healing space, blowing off steam and decorating the mobile pod with brightly colored paints. See: *Healing Spaces*, p. 58

Neighborhoods Now: 82nd Street Partnership

Team: Van Alen Institute, Urban Design Forum, 82nd Street BID, ARO, Design Advocates, LTL, MOS, nARCHITECTS, SO-IL, Silman Engineering, and VHB

Location: 82nd Street between Baxter Avenue and 37th Avenue, Jackson Heights, Queens, New York City, New York

Year: 2020–ongoing

Project Type: Technical support network

To facilitate unique collaborative solutions to challenges presented by the pandemic, the Urban Design Forum and Van Alen Institute—non-profit organizations that advocate for improving the public realm—created Neighborhoods Now. This initiative supported the formation of partnerships between local design firms and connected these teams of professionals to community organizations within neighborhoods highly impacted by the pandemic. Queens is home to a large percentage of non-English speakers and immigrants and to two of the New York City neighborhoods hardest hit by the pandemic, Jackson Heights and Elmhurst. To support this neighborhood and its many small businesses a team of designers from seven professional practices worked alongside community members and the 82nd Street Partnership, a well-established neighborhood development organization, to transform six blocks within the 82nd Street BID into a place for community recovery. This corridor had served as the site of the annual *Viva La Comida!* Street Festival since 2011. The lively event had long celebrated the cultural diversity of the neighborhood, featuring food, music, art, and dancing, so the BID proposed it as an ideal spot for a designated Open Street.

After initially meeting community members door-to-door, the Neighborhoods Now team identified areas where it could best offer support, skill, or materials. It then set to work with the goals of providing small businesses a lifeline and restoring joy

in the community through tactical design interventions that were both colorful and useful. The team spent six weeks during the summer of 2020 working closely with community members to complete an Open Streets application, design and construct street closure barriers, host community volunteer sessions, develop design recommendations for social distancing, provide informational public health signage, and plan future events. The design team worked with community members to design and fabricate hanging planters, planter boxes, and barriers with readily accessible, affordable, and reused materials. Alongside personalized spatial plans for businesses and guidance in the permit application process, these interventions contributed to returning the streetscape to a vibrant, healthy space.

To root its work in the neighborhood, the team occupied a vacant storefront space that was loaned by a member of the 82nd Street BID as a field office. This served as a workspace for fabrication, supply storage, and a center where community members could interact directly with the designers on weekends, contribute to the BID's Open Streets proposal, and receive support filing Open Restaurant applications. Team members Jing Liu and Emma Silverblatt of SO-IL expressed comfort working in Jackson Heights, as they had established community connections during prior projects. The maintenance of this relationship was central



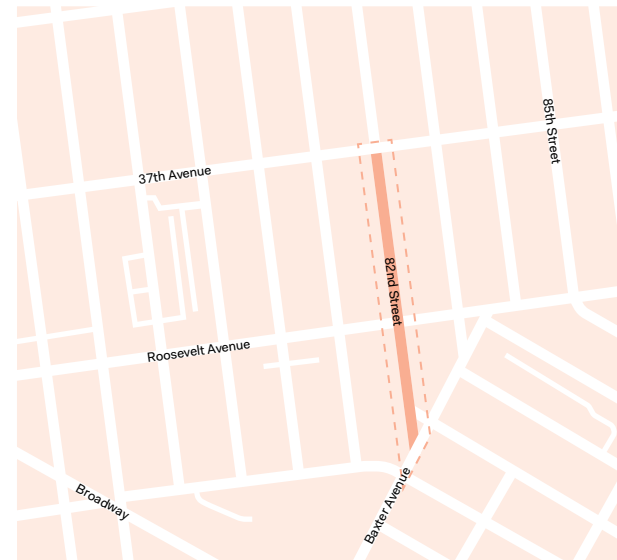
▲ A sidewalk seating installation at Las Americas Bakery was fabricated using readily accessible milk crates.

▶ Volunteers plant tree pits and planters with local community organization, The Jackson Heights Beautification Group.





- ◀ Design volunteers collaborate on the fabrication of planter bags.
- ▶ Clockwise from top left: Planter bags decorate the roadway seating barriers at Thakali Kitchen, and quickly brighten the roadway dining space in an inexpensive manner; Volunteers paint roadway seating barriers; Designers provide free consultation on City reopening policies and regulations.



Neighborhoods Now, Jackson Heights, Queens



“Being in the neighborhood taught us about the community’s real challenges and how intersections between policy and public realm design impacts people’s experiences and lives—important knowledge to gain as designers and planners.”

— Jing Liu, Co-Founder, SO-IL

Key Facts

In early fieldwork, the team identified 50% of local businesses were closed or nearly closed.

NYC DOHMH reports that by Spring 2022, a third of people in Jackson Heights had been diagnosed with COVID-19—a case rate of nearly 2.4x the city rate.

The initiative supported 20+ restaurants in participating in NYC’s Open Restaurants program.

The team designed three Open Space, Open Community seating areas to augment existing urban spaces.

Takeaways

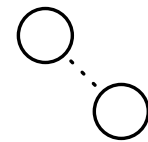
Communities can be brought together by organizing around the streetscape as a shared resource.

Technology and language accessibility is essential for equitable communications about City programs and public health measures.

A field office model is a creative way to sustain community relationships in collaborative projects.

When communities have shared decision-making power, local health needs are prioritized.

Design for Play Competition



Team: Design for Six Feet; the Awesome Newburgh Foundation; the City of Newburgh; Columbia Graduate School of Architecture, Planning & Preservation Hudson Valley Initiative; Dept of Small Interventions; The Fullerton Center; and the Newburgh Armory Unity Center

Location: Newburgh, New York

Year: 2020, 2021

Project Type: Design competition for a temporary installation

When urban designers Kaja Kühl, Anna Dietzsch, and Liz McEnaney saw streets transform into spaces for dance parties during the summer of 2020, they knew they were witnessing an extraordinary moment for the public realm. To collect and amplify these initiatives, they created @designforsixfeet, an Instagram account that crowd-sourced images of activated spaces and interventions during the pandemic. The social media account soon morphed into a design collaborative that aimed to experiment with new spatial practices to benefit community wellness and create long-term change.

Prompted by a conversation with a city planner in Newburgh, New York, Design for Six Feet observed that simply opening streets to pedestrians did not provide dedicated spaces for young people to engage with the city. To remedy this, the team worked with local partners to launch a competition for designs

that prioritized play spaces for children in Newburgh's public realm. *Newburgh: Design for Play* received more than 70 entries from designers around the world. Jurors divided the projects into three categories: permanent structures, movable structures, and kits of parts. A jury selected three winners, whose entries considered the physical health and emotional wellbeing of local youth. Two of these winning projects, *Imagination Pavilion* by Starr Whitehouse Landscape Architects and Planners, and *MakerBoards* by downupNY, were implemented in the fall of 2020. The third project *Play and Paint* by Anoushé Eirabie and Yaxin Jiang was implemented in the Fall of 2021. These designs activated space in Newburgh's town center, encouraging people of all ages to play and create, spurring neighborhood interaction while simultaneously respecting the need for social distancing.



▲ Community members participate in decorating components of the Imagination Pavilion, a flexible space for creative play and puppet shows near the public library.



- ▲ Local residents draw and write messages to others on the MakerBoards installation.
- ▶ The MakerBoards design team intended for the dual-sided windows to allow co-creation while mitigating COVID-19 exposure during the early months of the pandemic.



“Summer 2020 was this extraordinary moment to test out everything. People became more engaged in what the public realm is, or what it should be.”

— Kaja Kühl, Co-Founder, Design for Six Feet

Healing Spaces

Team: A+A+A; Brownsville Community Justice Center and local youth; Chaos Built; Emmanuel Oni; Excelsior Iron Works; Jeniffer Carmona and Riana Tan from the Cornell AAP NYC Program; Next Generation Gems, and Youth Design Center

Location: Osborn Plaza, Osborn Street at Sutter Avenue, Brownsville, Brooklyn, New York City, New York

Year: October 2020 and Summer 2021

Project Type: Mobile installation

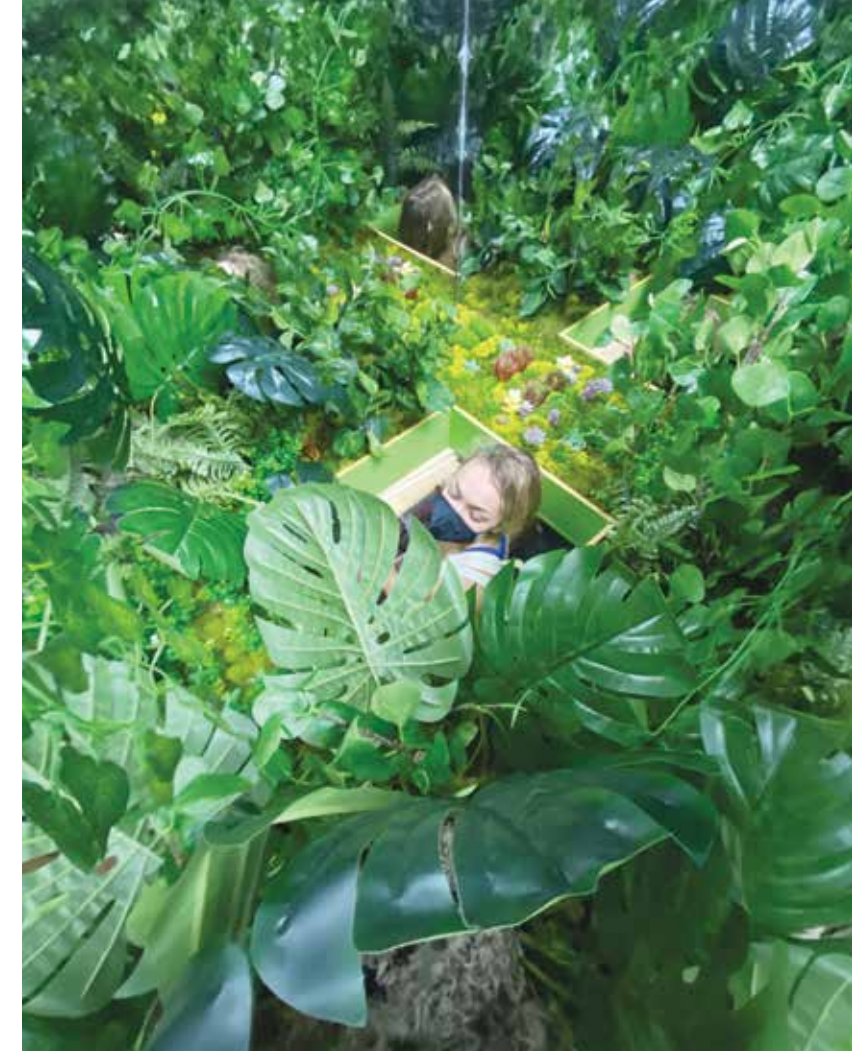
In 2020, as part of its community-based placemaking and social justice programming related to ameliorating violence and strengthening community trust, the Brownsville Community Justice Center (BCJC) asked its longtime local community partner, Youth Design Center (YDC), to collaborate on facilitating creative design research and framing workshops to provide spaces and resources for trauma-informed healing. YDC hired design studio A+A+A to help facilitate multi-week technical workshops with local teenagers and mentorship groups to consider how physical spaces can foster healing from traumatic events. Youth participants explored problem-solving through design—dreaming up spaces in which both they and their neighbors might be able to enter and find comfort. The design team then actualized these ideas as designs for mobile “Healing Sanctuaries,” portable installations intended to engage community members in specific types of healing: “Community Sanctuary” pods for group healing and mobile “Headspace” for individual respite. YDC executed much of the construction within its in-house Fabrication Lab.

One Community Sanctuary resembles a portable greenhouse with transparent walls.

Inside the wheeled structure, a message board and phone line allow visitors to record stories, while cubbies provide space for visitors to donate or borrow small objects representing personal healing. A second community installation, fabricated in 2021, is an opaque white mobile pod called the “Release Room,” which has an intimate interior with padded walls and weighted pillows where visitors can release negative energy. Young community members blew off steam and decorated the pod’s exterior walls with colorful streaks of paint, by punching its facade with paint-dipped boxing gloves.

The three Headspace installations allow individual participants to perch on a stool and insert their heads into elevated panoramic cubes curated to offer a moment of escape and foster individual healing through meditation, closeness to nature, and a change of perspective. Healing Sanctuaries were first displayed at Osborn Plaza and subsequently within the neighboring NYCHA campus. The group plans to bring the installations to other spaces throughout the neighborhood to continue facilitating community adhesion and healing through youth programming.

- ▶ One of the “Headspace” installations allows individuals a brief escape into a seemingly endless vegetated space.
- ▼ A transparent “Community Sanctuary” pod encourages visitors to record their personal stories.



▶ The installation's "Calm" zone includes an integral hammock, designed for informal relaxation.



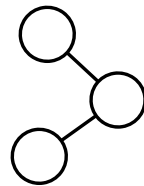
Restorative Ground

Team: WIP Collaborative, Urban Design Forum, Hudson Square Properties, and the Hudson Square Business Improvement District

Location: King Street between Hudson Street and Greenwich Street, Hudson Square, Manhattan, New York City, New York

Year: 2020 competition, 2021 installation

Project Type: Temporary multi-use modular construction



Located on an underutilized street in Hudson Square, Restorative Ground is the winner of "Care for Hudson Square," a public realm pandemic recovery design competition. The placemaking installation builds on women-led WIP Collective's research into urban design solutions for neurodiverse populations and comprises three interconnected modules that employ a variety of surface treatments and form a vibrant topography with distinct occupancy intentions: Focused, Active, and Calm. The "Focused" zone encourages concentration and collaboration with a large table and seating, whereas the "Active" zone provides space for higher intensity activity and

movement. The "Calm" zone creates a space of respite with hammock seating designed for passive lounging. This temporary installation has been well-used by local construction workers during their break times, by teenagers hanging out after school, by skateboarders practicing tricks, and by toddlers exploring the colorful forms. The installation creates enough flexibility and space for conflicting uses, fostering the coexistence of disparate user groups in the public realm. The project keenly illustrates the importance of considering the wellness of diverse populations and varied user needs when designing public spaces.



▶ Clockwise from top left: The "Focused" zone's large table provides space for out-of-office work or a lunch break; Children swing from a hoop over the stepped topography in the "Active" zone; The installation straddles the curb and wraps around existing street trees, occupying the parking lane and part of the broad sidewalk.

3



Streets for Justice

Whether through collective demonstration or individual action, city streets can be used to congregate people and inspire change. In the summer of 2020, thousands of protestors filled streets in cities across the United States following the murder of George Floyd. These demonstrations follow a long history of people physically occupying roadways and plazas to lay claim to their right to public space. Mobilizing within the space of the street allows protestors visibility and has given rise to an increase in localized activism within public spaces. The projects in this chapter highlight diverse ways in which communities have made streets integral to advocacy for social and environmental justice. In two of these cases, art is used as a powerful tool to revitalize public spaces for social engagement and expression. With the Clean Air Green Corridor initiative, high school students work to bring their curriculum to life and re-imagine the design of the streetscape in front of their school. In California, a collaborative effort resulted in a toolkit of strategies for advancing equal rights for the often-overlooked unhoused population. And, during the pandemic, community members across the country organized online to develop grassroots food distribution and mutual aid networks to serve neighbors in need. Building upon these localized efforts, how can our public spaces be designed to serve a democratic purpose and allow freedom of expression and movement?



NYC-based artists and community volunteers gather to transform 1,500 feet of construction fence in East Harlem as part of the Grandscale Mural Project. See: *125th Street Plaza*, p. 72

Clean Air Green Corridor

Team: Washington Heights Expeditionary Learning School (WHEELS) Corridor Youth Leaders, including 9th through 12th graders; Futures Ignite (formerly Friends of WHEELS); and WHEELS faculty

Location: West 182nd Street from Broadway to Amsterdam Avenue, Washington Heights, Manhattan, New York City, New York

Year: 2017–ongoing

Project Type: Corridor improvements and youth leadership initiative

The Clean Air Green Corridor is a Black and Brown youth-led community initiative rooted in Washington Heights. In 2017, a group of students at Washington Heights Expeditionary Learning School (WHEELS) embarked on an intensive interdisciplinary course exploring the restoration of their neighboring Highbridge Park. Dr. Jared Fox, an environmental and climate science teacher, and Mr. Erick Espin, a history teacher, created an environmental justice-centered curriculum paired with hands-on restoration work in the park through a partnership with the New York Restoration Project. Through the course, which connected data analysis to lived experience, students researched the local consequences of redlining, the public health impacts of being located next to the I-95 highway, and the injustice of inequitable greenspaces and environmental racism in Washington Heights.

The curriculum underscored the value of community-based research. When the intensive academic course ended, a group of six youth leaders stayed involved, researching on the weekends, attending community board meetings, and working with teachers and partners at WE ACT for Environmental Justice to develop a vision for the 182nd Street Clean Air Green Corridor. The students' vision for the Corridor reimagines 182nd Street from Broadway to Amsterdam Avenue as a pedestrianized green pathway, safely connecting the five schools located along the way to open space and community resources. What

began as work in the classroom informed youth-led advocacy efforts supported by nonprofit organization, Futures Ignite, and its afterschool and summer programming.

Students spent time outside their classrooms leading community engagement and stewardship efforts. Collaborating closely with urban planning, design and community development nonprofit partner, Hester Street, the WHEELS afterschool students dreamed up an idea for a streetscape plaza located on the school's block, which includes spaces for community gathering, public artwork, a green roof, and more efficient trash and recycling infrastructure. Youth leaders see the potential of the corridor to be an intergenerational environmental justice hub and a youth-affirming space. Together with designers from Hester Street, the students co-designed the renderings and graphics demonstrating their ideas.

Through a relationship with the Center for Resilient Cities and Landscapes, NASA's Goddard Institute for Space Studies, and the Columbia University Earth Institute, WHEELS students also worked with Columbia University Architecture and Planning students and faculty to refine their concepts for the corridor, conduct field work studying urban heat islands, and pursue a connection to the NYC DOT Open Streets Program. Their collaborative classroom research gave students the framework and analysis needed to turn their designs into advocacy. The youth leaders have presented



- ▲ WHEELS students created advocacy visuals, framing their goals and proposing next steps for the Clean Air Green Corridor.
- ▶ A street closure sign notifies drivers to choose another route, allowing students and community members the opportunity to draw and play in the street.



“This is a critical and powerful moment to evaluate the relationship and the disconnection between schools and streets.”

— Molly Delano, Executive Director, Futures Ignite

“All young people regardless of their zip code or social and economic circumstances should be able to go to school in a healthy and green community. We want other young people throughout NYC to learn about our work and realize they can do the same for their schools and their communities and inspire change.”

— Noelia M., Class of 2023 student, WHEELS

▼ Students worked with designers from Hester Street to envision and illustrate what the Clean Air Green Corridor has the potential to become.



▲ Students create tape art and play basketball in the roadbed between their school buildings.

their work to Community Board 12, City Council members, potential partners, and the community. Through their advocacy, streetscape infrastructure including tree guards and NYC DOT decorative planters were installed along 182nd Street.

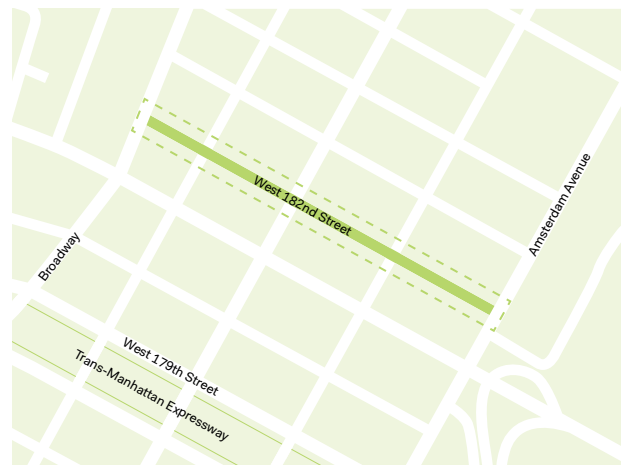
The project is sustained by active youth leadership as the original cohort passes on their knowledge to incoming students. Additionally, alumni who contributed to the Clean Air Green Corridor have returned to WHEELS to co-facilitate the Futures Ignite Environmental Justice Summer Institute—a unique opportunity that fosters the expansion of leadership skills in community organizing, community science, and policy advocacy, even after graduation. Through this project, students have utilized local knowledge to reimagine the possibilities of the street and public spaces.

The initiative was featured at Park(ing) Day 2021, when WHEELS, Futures Ignite,

ASLA-NY, the PDC, and NYC Planning collaborated to implement a pop-up installation that reflects the students' work. The event set the stage as a model for a future Open Street, with a pop-up park along with educational and urban-design activities. The pop-up transformed the entire block between the school buildings of WHEELS and I.S. 143 to demonstrate the need for a healthier, safer, and more engaging streetscape for learning and to inspire the next generation of environmental stewards, public health professionals, landscape architects, and planners. With ambitious goals to address climate change within the Washington Heights community, the Clean Air Green Corridor team and its partners have taken steps to transform 182nd Street into a verdant and vibrant corridor, which can serve as a replicable model for communities elsewhere.



- ▲ ASLA-NY volunteers teach students and community members how to pot and care for plants during the Park(ing) Day 2021: Día de Calle Verde event.
- ▶ WHEELS students clean and mulch the tree pits along West 182nd Street following the installation of new tree guards.
- ▶ Students pose proudly with their freshly-potted plants in a pop-up roadway park.



Clean Air Green Corridor, Washington Heights, Manhattan



▲ WHEELS and Futures Ignite host various creative and exploratory activities along the corridor during community engagement events.

Key Facts

In an eco-audit students found that the four-block length of 182nd Street only had 38 trees.

Students found elevated levels of fine particulate matter, an air pollutant with a detrimental effect on human health, along the corridor.

Park(ing) Day is an annual event hosted by ASLA that encourages designers and community members to transform parking spaces into temporary parklets.

Students worked with the Center for Resilient Cities and Landscapes to map the differences in average summer temperatures across Washington Heights.

Takeaways

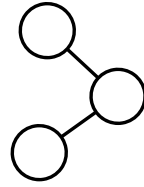
Incorporating principles of environmental justice into street design can improve quality of life and public health.

When schools connect to their adjacent streets, these corridors can be safer, healthier spaces that foster engagement, play, and stewardship.

Young people can serve as agents of change in their communities.

A replicable organizing model can inspire and empower people anywhere to contribute to change within their own communities.

Black Lives Matter Mural at Foley Square



Team: Thrive Collective, TATS Cru, WXY Architecture + Urban Design, Tijay Mohammed, Sophia Dawson, and Patrice Payne

Location: Centre Street at Foley Square, Manhattan, New York City, New York

Year: 2020

Project Type: Mural

In the summer of 2020, streets were used as a space for people to organize against social injustice and institutionalized racism as part of the Black Lives Matter movement. Streets also became a place for artistic support of the movement, when across New York City and throughout the world, roadways were painted with the message “Black Lives Matter.” A collaborative effort between architects, designers, and urban planners, the Foley Square Mural covers three blocks in the civic center of New York City adjacent to the African Burial Ground. The 600-foot-long mural was created by three artists,

each taking responsibility for a single word: Tijay Mohammed (“Black”), Sophia Dawson (“Lives”), and Patrice Payne (“Matter”). The mural shows how social and political artwork in the public realm can become an important way for the community to reclaim public space, particularly as historically racist policies and policing have sent the message that Black lives are not safe in such spaces. The extensive community engagement process that informed this project also serves as a restorative measure, reframing the streetscape as a place that fosters equitable expression and exchange.



▲ The 600-foot-long mural faces the courthouses in Foley Square.

▶ A diagram from the Toolkit shows that “many different factors come together to shape and sustain coexistence in our public spaces.”



Coexistence Toolkit

Team: SPUR; Gehl; Guadalupe River Park Conservancy; and City of San José Parks, Recreation, and Neighborhood Services Department

Location: San José, California

Year: 2021

Project Type: Toolkit of engagement exercises



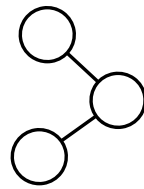
Published in 2021, the Coexistence Toolkit explores issues of public space access, safety, and design, with the unhoused population in mind. The project uses Guadalupe River Park, a public space improvement project in San José, California, as a case study to provide city agencies, non-profit organizations, and stewards of the park with guidance on fostering coexistence in community planning processes. The Toolkit’s guided engagement exercises include people who are experiencing homelessness and invite participants to identify what makes them feel comfortable in public spaces, ultimately facilitating the discovery of shared values and the formation of social contracts. Because the unhoused population is often excluded from planning processes, designing for an equitable streetscape requires challenging this notion. The Toolkit states, “all people,

whether they have a permanent home or not, have a right to access and participate in public space.” Identifying and establishing shared community values is vital to achieving safe coexistence for all people within public spaces. The Toolkit includes exercises about shared values, acceptable behaviors, and accountability that public space stewards can use to gather public input, which can in turn inform design and policy decisions. It acknowledges that individual reactions toward public spaces, including levels of comfort and discomfort, vary based on identities and lived experiences, and it offers a way to respond to and design for this dynamic. The Toolkit’s community engagement exercises present an approach that helps cities rethink who their public spaces serve and fosters a more empathetic and equitable public realm.

► Fifty artists per year are selected to design murals along the corridor, including artist Gera Lozano whose 2021 mural created a quilt of colorful West African Kente fabric inspired shapes representative of the diverse local community.



125th Street Plaza + Grandscale Mural Project



Team: Uptown Grand Central

Location: East 125th Street between Park Avenue and Lexington Avenue, 125th Street Plaza, East Harlem, Manhattan, New York City, New York

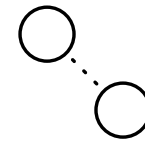
Year: 2019–ongoing

Project Type: Mural

Uptown Grand Central, a group formed by The New Harlem East Merchants Association (NHEMA), works to uplift and strengthen the community along the East 125th Street corridor through advocacy and place-based projects with visual impacts. The organization programs the East 125th Street Plaza, working with the unhoused population in the area. The plaza is now the location of community resources including a GrowNYC Fresh Food Box program, NYC Zero Waste compost collection, free Zumba classes, live concerts and a pop-up snack shop that supports local small businesses. Each summer since 2019, Uptown Grand

Central has also worked with property developers and non-profit organizations to turn a construction fence into a vibrant three-block mural gallery. The organization put out an open call for New York City-based artists, specifically with connections to Harlem, Upper Manhattan, and the Bronx. The resulting murals embody a form of community dialogue, exploring a range of themes such as transportation, domestic violence, and hope. This multifaceted place-based resource infuses the neighborhood with civic pride, offering opportunities to engage in healthy activities and celebrate the corridor’s social and cultural assets.

Community Food Access and GrowNYC



Team: GrowNYC, neighborhood mutual aid groups, and community members

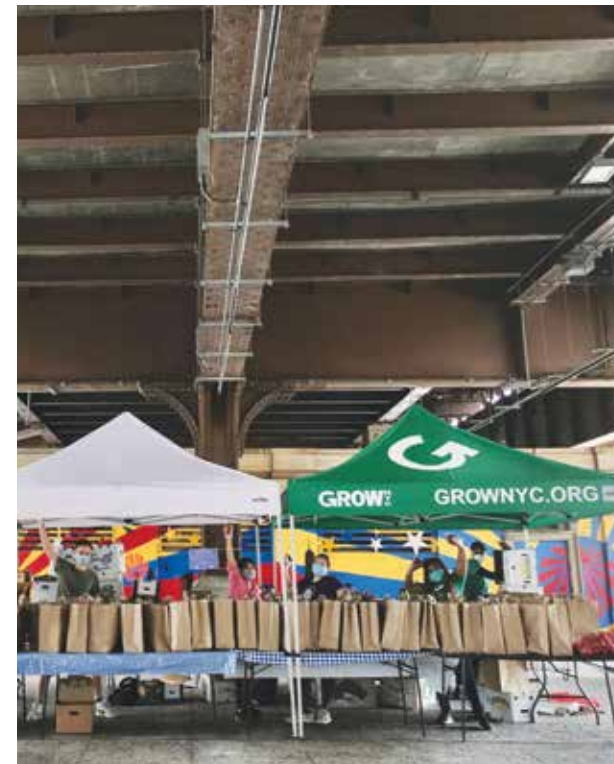
Location: New York City, New York

Year: 1976–ongoing

Project Type: Pop-up markets and community food pantries

Since 1976, New York City’s Greenmarkets have provided urban dwellers with access to fresh local produce. Partnering with City health agencies and other organizations, GrowNYC has expanded their programs to address food insecurity, build community gardens and compost sites, and educate New Yorkers. During the pandemic, longstanding

programs like these were supplemented with community-organized food pantries, fridges, and other food distribution sites, often managed by newly created mutual aid groups. These programs utilize the street as a site for accessing affordable and healthy food, providing an essential foundation for equitable physical wellness.



▲ A GrowNYC Fresh Food Box distribution site under the elevated railroad tracks at East 125th Street Plaza, Manhattan.



▼ A GrowNYC composting site outside a community garden on West 126th Street in Harlem, Manhattan.

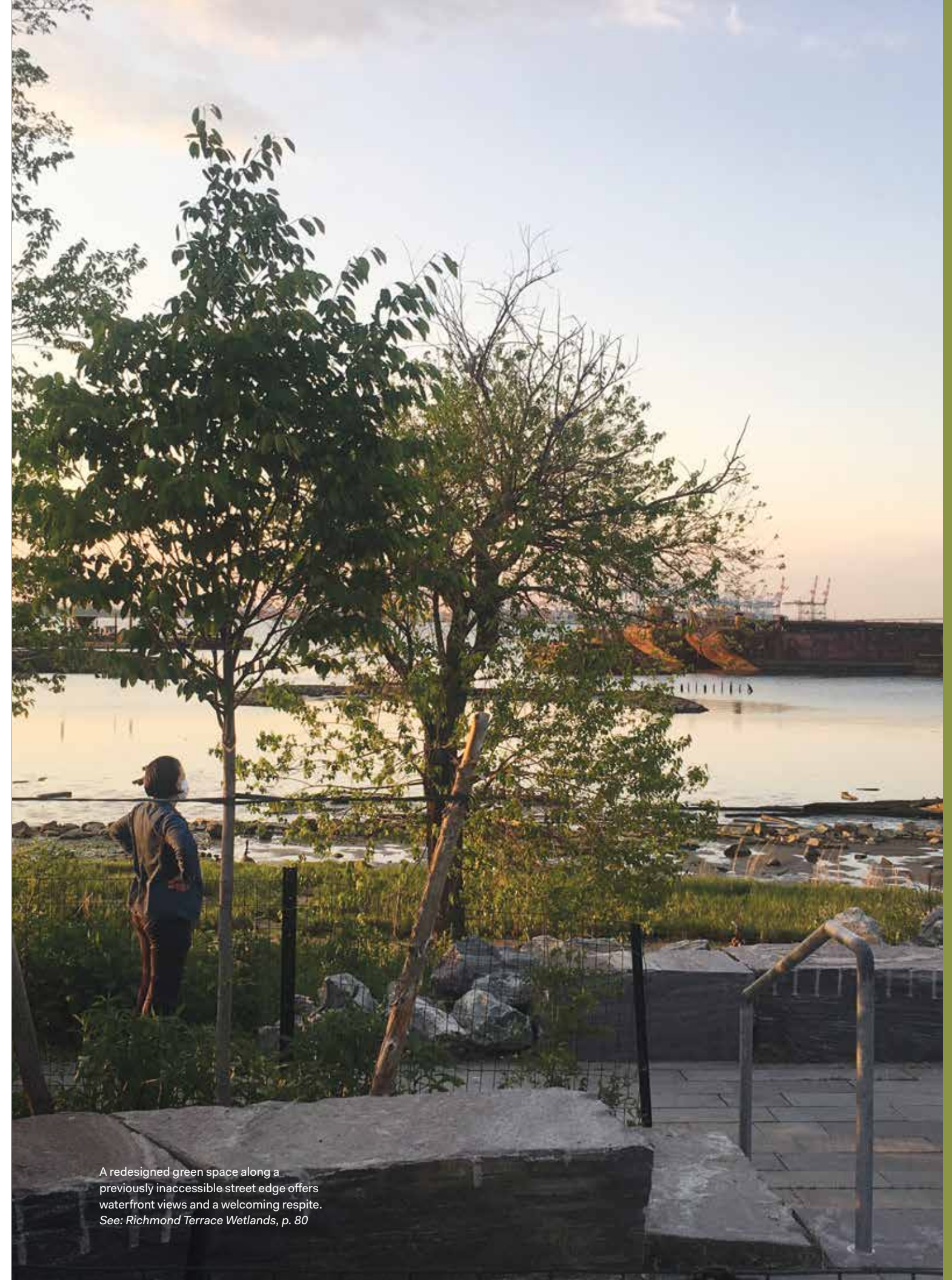
4



Parks, Plazas, and Peripheries

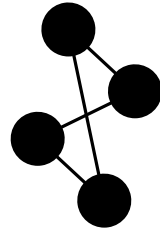
Streetscapes play an important role in connecting people to adjacent open spaces such as parks and plazas, which are essential public health resources. Access to parks can positively impact mental health, allowing users moments of respite and closeness to nature. Parks and plazas also provide venues for exercise and physical activity, contributing to physical health. The presence of urban vegetation cools down surrounding neighborhoods, mitigating urban heat island effects, creating more comfortable environments, and reducing stormwater runoff. Within high-density urban environments, parks also offer calm places for reflection, especially when designers have incorporated trees and understory plantings that provide the sounds of nature and seasonal visual interest, helping to mitigate the noise of the city. In addition, emerging research identifies that vegetated public open space increases community cooperation and a sense of belonging.¹⁷ It is vital that green spaces appear welcoming, inclusive, and accessible to the surrounding community so that these health benefits are extended to all.

To better integrate green spaces within neighborhoods, NYC Parks launched the Parks Without Borders (PWB) initiative to create more welcoming connections between parks and communities through strategic design modifications such as lowering fences, widening entrances, improving landscaping, and adding amenities along peripheral streets. NYC DOT and NYC Parks have also partnered to co-locate parks and transit stations, coordinating entrances with crosswalks to allow transit users safe access to green space during their daily commutes. Parks can also be used to activate underused spaces and attract people to existing natural features, such as urban waterfronts, helping build connections between communities and health-enhancing resources.



A redesigned green space along a previously inaccessible street edge offers waterfront views and a welcoming respite. See: *Richmond Terrace Wetlands*, p. 80

Seward Park



Team: NYC Department of Parks & Recreation, Seward Park Conservancy

Location: Seward Park and Straus Square, Canal Street and East Broadway between Essex Street and Jefferson Street, Lower East Side, Manhattan, New York City, New York

Year: Completed in 2020

Project Type: Capital park reconstruction

The design of a park's perimeter plays an essential role in defining its relationship with the surrounding community. Tall fencing, poor signage, and underused spaces may serve as visual barriers to entry. NYC Parks' Parks Without Borders (PWB) program recognizes the importance of reimagining these perimeter spaces and creating visual connectivity between parks and their neighboring communities. The program includes welcoming entrances, edges, and park-adjacent areas.

As part of this program, community members were given the opportunity to nominate parks in need of perimeter redesigns and to identify specific areas they would like to see changed or improved. Based on online and in-person outreach, the team selected eight showcase projects throughout the city. The reconstruction of Seward Park, a historic Lower East Side park, was completed in January 2020, marking PWB's first completed reconstruction project. Additional showcase projects include Prospect Park (Brooklyn); Van Cortlandt Park and Hugh Grant Circle/Virginia Park and Playground (Bronx); Jackie Robinson Park (Manhattan); Faber Park (Staten Island); and Flushing Meadows Corona Park (Queens).

As a key example of the program's strategies, the renovation of Seward Park has reimagined how the park can boost visual appeal and connect to its surrounding streetscape. This project enhanced linkages between the park and the adjacent streetscape by lowering the perimeter fences, planting street trees, and opening and transforming an abandoned street between the Seward Park Library and the park.

A garden area, previously inaccessible to the public, was reimagined with seating

and paths that more seamlessly joined the library plaza via the garden to the remainder of the park. Historical elements of the park were preserved, including a marble mosaic map of the neighborhood and a bronze statue of *Togo*, the famous sled dog. Within the park, the PWB team restored pavement and existing landscaping and added new planting, tables, seating, and exercise equipment. The park is now accessible and enjoyable for all ages with playground equipment, basketball courts, benches for resting, and open space for practicing dance and tai-chi. The variety of options for physical play, exercise, and quiet respite make Seward Park an exemplary space for physical wellness.

As a related element of the project, a new courtyard with low amphitheater-style seating and an expanded garden in front of the Seward Park Library enhances the connection between the park and its landmark-designated neighbor. This adjoining space, now open for community programming, provides the library with a new venue for publicly accessible family story time, book talks, and movie screenings. This variety in cultural programs offers visitors joyful and collective experiences, further cultivating community wellness. To round out Seward Park's newly accessible amenities, NYC Parks worked with NYC DOT to close the adjacent Straus Square slip lane to traffic, integrating the triangular plaza into the open green space. This reclaimed pedestrian space hosts a Citi Bike dock, as well as painted concrete barriers with built-in benches that offer traffic protection and seating. The addition of this space further extends the beauty of the park to the sidewalk and triangle, encouraging use of what is now a remarkably imaginative local resource.



- ▲ Historic park elements, such as the *Togo* sculpture were preserved and celebrated at areas visible from the adjacent street.
- ▶ Amphitheater-style seating allows for informal social gatherings and creates space for community programming near the adjacent library.





- ▲ A new seating area establishes an improved connection between Seward Park Library and the adjacent garden and street.
- ▶ A historic street between the library and park transformed into a public open space.
- ▼ Reduced fence heights and public amenities, such as accessible water fountains, create a more welcoming public space.

“New York City’s parks are vital to the health and wellbeing of New Yorkers. When we reimagine where they meet the streets and sidewalks, they become extensions of the communities they serve.”

— Sue Donoghue, Commissioner, NYC Department of Parks & Recreation

▶ The Straus Square slip lane adjacent to Seward Park was converted to pedestrian space with a CitiBike dock and painted concrete barriers.



Seward Park, Lower East Side, Manhattan

Key Facts

New York City has nearly 30,000 acres of parkland.

Tall fences that surround many parks were constructed as security measures from the 1930s through the 1970s.

More than 6,100 New Yorkers participated in the park nomination process for the Parks Without Borders initiative.

Fences around Seward Park were reduced from 7'-6" in height to 4'-0" in height.

Takeaways

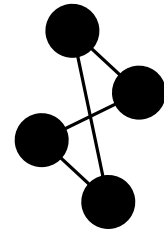
A park’s periphery can enhance the quality of both the surrounding streetscape and the park itself.

Lowering fences improves sightlines into the park, increasing a sense of safety and welcoming the local community.

Hosting activities for people of all ages in park spaces cultivates a sense of welcomeness.

Underused roadways can be integrated into adjacent parks to increase public open space.

Richmond Terrace Wetlands



Team: NYC Department of Parks & Recreation, the NYC Mayor's Office of Environmental Remediation, NYC Department of Transportation, Northfield Community Local Development Corporation, North Shore Waterfront Conservancy of Staten Island

Location: Richmond Terrace, between Van Name Avenue and Van Pelt Avenue, Staten Island, New York City, New York

Year: Completed in 2019

Project Type: Capital park construction

Completed in 2019, this narrow park along Richmond Terrace provides the community with access to the waterfront while preserving protected wetlands. Part of the PlaNYC 2030 public plaza program, which aims to accommodate all New Yorkers with open spaces within 10-minutes walking distance from their homes, the park transformed a previously inaccessible waterfront street edge into a welcoming respite from the city. The redesigned green space allows neighborhood residents to immerse themselves in nature and get close to the water via an accessible pier and

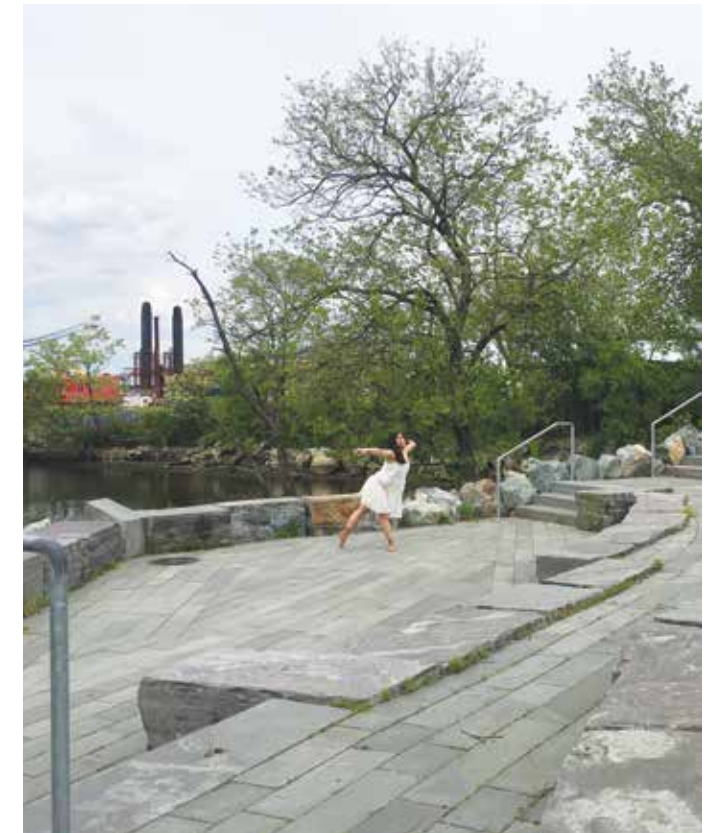
walking path that runs through the North Shore's woodlands, offering views of the Kill Van Kull channel and the Shooter Island bird sanctuary. The park's adjacency to both a public bus stop and local wildlife makes it an ideal location for environmental education, with a gathering space on the east side of the park serving as an outdoor classroom. Richmond Terrace Wetlands is a connector between the street and the waterfront, inviting Staten Islanders to engage with their unique surroundings. In 2016, the PDC presented this project with an Award for Excellence in Design.



▲ Adjacent to a public bus stop, this park provides the community with convenient access to the waterfront.



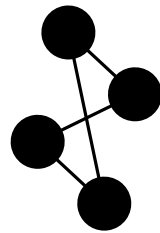
- ▲ Wooded gathering spaces allow for quiet reflection a short distance from the street.
- ▶ Stepped seating by the waterfront provides views across the channel and doubles as an educational or performance space.





▲ A conceptual rendering illustrates a variety of seating spaces, walking paths, and trails at the now-constructed park entrance.

Prospect Park Perimeter



Team: NYC Department of Parks & Recreation, Prospect Park Alliance

Location: Flatbush Avenue between Grand Army Plaza and Empire Boulevard, Brooklyn, New York City, New York

Year: Completed in 2021

Project Type: Capital park improvement

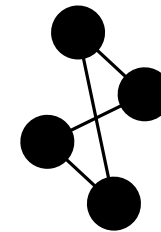
To reduce visual barriers and increase access along a previously fenced-off section of the Olmsted-designed Prospect Park, the Prospect Park Alliance (PPA) designed two new entrances along Flatbush Avenue. Part of NYC Parks' PWB initiative, the site was nominated by the community with the goal of increasing equitable access and connectivity for residents who live in the historically underserved neighborhoods east of the park. The project added more than 150 new trees, along with a variety of native understory and perennial plants to enhance the park's

landscape, which is part of NYC Parks' Forever Wild nature preservation initiative. Terraced seating and a stepping-stone path connect the entrances to the woodland landscape and a running trail, creating new portals between the neighboring east-side communities and the park's natural areas and amenities. In addition to the entrances, NYC Parks and PPA have been working closely with NYC DOT to add protected bike lanes and restore the historic sidewalk landscape design, including an allée of native trees, benches, and lighting.



► Greenacre Park's waterfall masks nearby street noise, and its tiered, tree-filled site allows for a sense of escape from its bustling urban setting.

Greenacre Park



Team: Sasaki Associates, Greenacre Foundation

Location: 217 East 51st Street, Manhattan, New York City, New York

Year: Completed in 1971

Project Type: Capital park construction

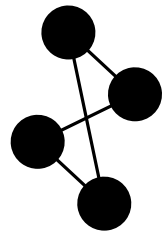
Greenacre Park is a world-renowned example of biophilic design (a practice of connecting people to nature). Originally designed by Hideo Sasaki in 1971, the 6,000-square-foot pocket park incorporates nature to create an atmosphere of tranquility in an urban setting. The space is enclosed by three walls, giving it a protected and tucked-away feeling. Comfortable chairs and tables are surrounded by dense greenery under the dappled shade of a canopy of trees. A 25-foot-tall waterfall and babbling fountain drown out the noise of the adjacent busy streetscape. A trellis roof and exposure to

sunlight keep the space at a comfortable temperature throughout the seasons. The park is configured as three distinct levels, providing users with a variety of seating options and environments. An outdoor café with moveable tables, ivy-covered walls, and seasonal flowers add to the intimate garden experience. The opportunity for quiet, reflection, and closeness to nature supports the mental health of city dwellers. Maintained by the Greenacre Foundation, the park is frequented by visitors and lunchtime crowds, receiving more than 200,000 visitors annually.



▲ New social seating and pedestrian lighting creates an inviting gathering space at a previously under-utilized space.

Hugh J. Grant Circle and Virginia Park



Team: NYC Department of Parks & Recreation, NYC Department of Transportation

Location: Westchester Avenue between Virginia Avenue and Metropolitan Avenue, Bronx, New York City, New York

Year: Completed in 2021

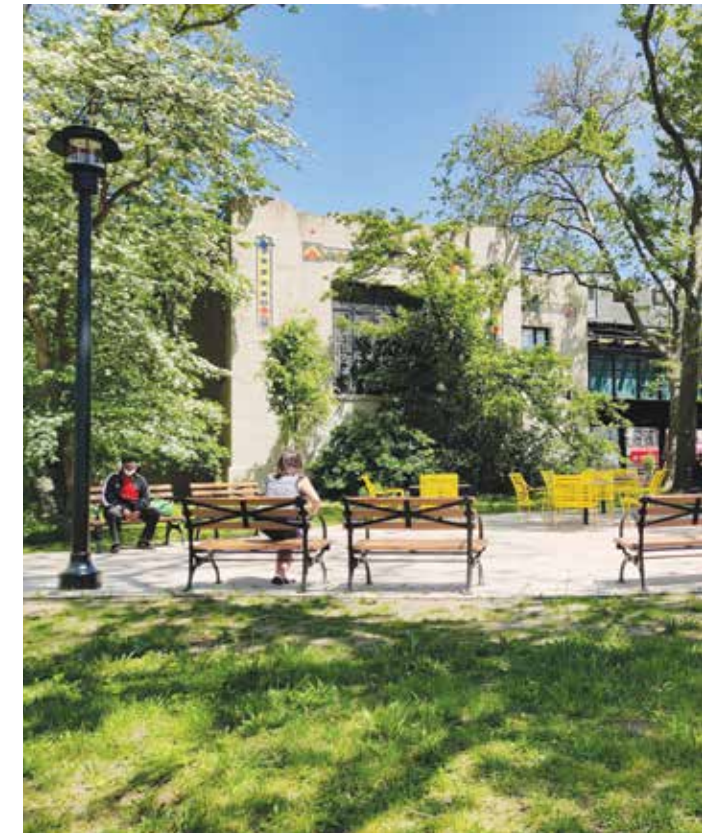
Project Type: Capital park construction

NYC Parks collaborated with NYC DOT on this project, which transformed a bleak traffic circle and an adjacent fenced-off, underused park into an inviting public green space. This reconstruction removed and lowered fences, improved circulation, joined spaces, and added amenities. The design features new paths for pedestrian flow

through the now-connected spaces, linking the elevated train station and busy bus stops via a restorative park landscape. Additional trees, plantings, seating, drinking fountains, and lighting transformed the space into a park that is used and loved by the local community and enjoyed by thousands of daily commuters.



- ▲ Each day, thousands of commuters use and pass through this revitalized green space that surrounds the elevated Parkchester train station.
- ▶ Though located within a busy traffic circle that is directly above the Cross Bronx Expressway underpass, this restorative landscape offers a moment of solitude.



5



Under the Elevated

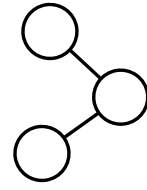
The spaces below transportation infrastructure have often been ignored and languished as little-used, leftover fragments of urban fabric. However, these underways, referred to as “EI-Spaces” by NYC DOT, have the potential to become vibrant parts of the streetscape and to enhance overall community health. In recent years, public agencies, designers, and community advocates have begun to see the value in transforming underways into spaces that are desirable to visit and functional to the neighborhoods surrounding them. Reclaiming these neglected spaces as multifaceted public resources can aid in the reconnection of neighborhoods that were bisected as a result of racist urban planning decisions that routed highways through communities of color and low-income areas. As New York City’s population expands, contextual design solutions for these spaces—which are often located in high-traffic areas—can help mitigate environmental impacts, like noise and air pollutants, improve pedestrian safety, and bring a host of new amenities to underserved communities.

Through its EI-Space initiative, NYC DOT has embarked on a comprehensive re-imagining of New York City’s underpasses through the development of pilots and design toolkits. Pilot projects have tested contextual design interventions intended to transform these spaces into desirable and usable locations for the community. For example, green infrastructure in underway spaces improves the pedestrian experience while helping to mitigate stormwater runoff. Overhead, creative lighting installations improve the perception of pedestrian safety and increase visitor interest. To date, the effort has resulted in the transformation of underway spaces into lively parks, event venues, and linear gardens that serve equally as mini-sanctuaries amid the urban bustle and the new community anchors that catalyze civic engagement.



Mirage by Paul Raff bounces light and colors from adjacent artist murals and lighting installations around the space beneath elevated infrastructure in Toronto, Ontario. See: *Underpass Park*, p. 97

El-Space Pilots



Team: NYC Department of Transportation, Design Trust for Public Space, Industry City, Rockaway Waterfront Alliance, Rockrose Development Corporation, ORE Design, Ciocchini Design

Location: 36th Street and 3rd Avenue, beneath the Gowanus Expressway, Brooklyn, New York City, New York; and Jackson Avenue beneath Dutch Kills Street, Long Island City, Queens, New York City, New York

Year: 2014–ongoing

Project Type: Pop-up installation

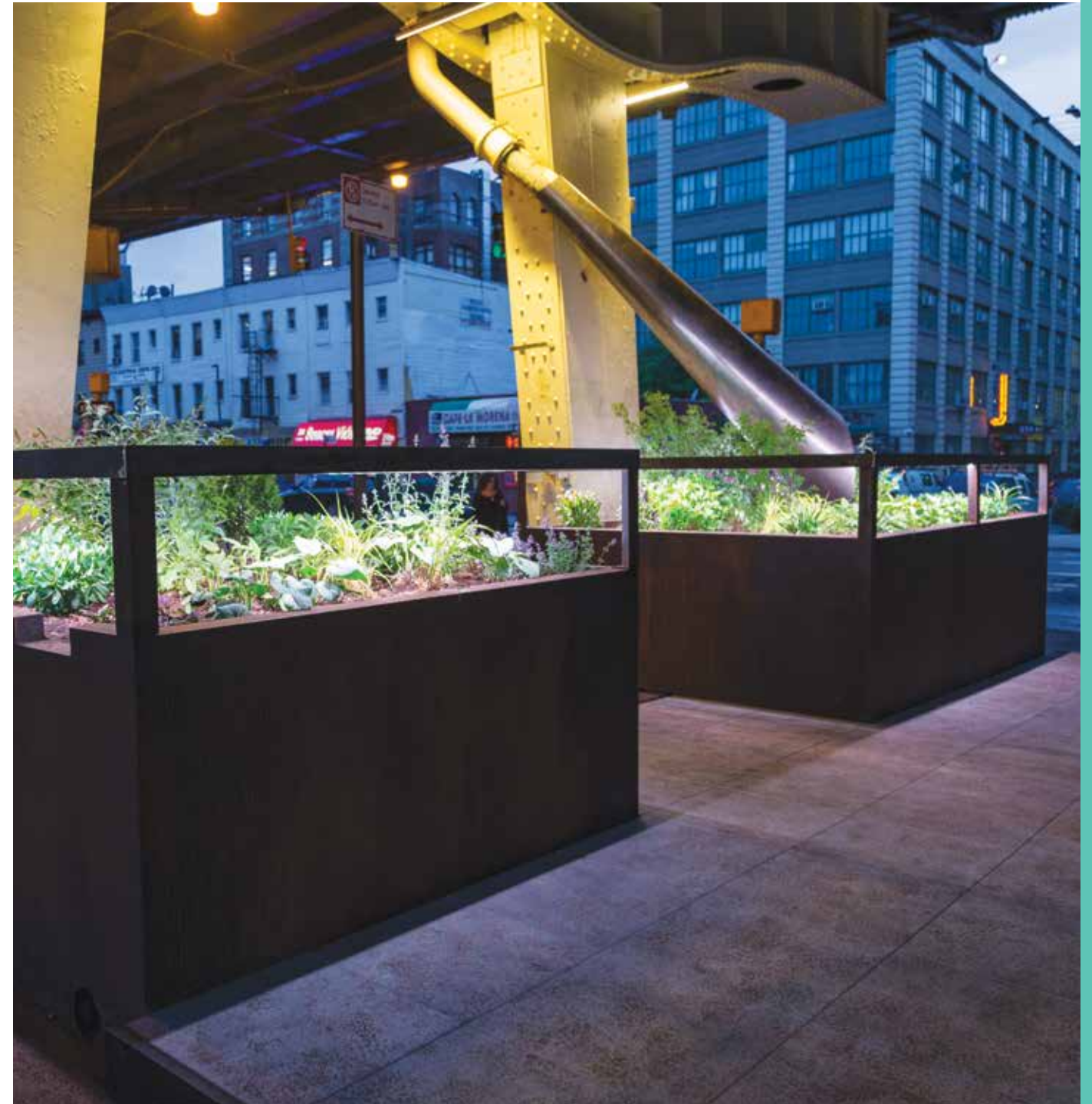
As a result of transit system development in the late-19th century and mid-20th century, New York City has nearly 300 linear miles of space beneath elevated transportation structures such as highways, bridges, above-ground subways, and other viaducts. NYC DOT recognized the potential of this resource and began a process of reimagining New York’s “El-Spaces.” These complex, often underutilized public spaces are frequently dark, unsafe, loud, or inaccessible. In collaboration with the Design Trust for Public Space and community partners, NYC DOT has experimented with solutions to transform these areas into improved streetscapes and public spaces. In the first exploratory project phase, the team identified, inventoried, and recorded existing conditions of El-Spaces in neighborhoods throughout New York City. Through participatory workshops, the team developed recommendations for design and programming strategies. Applying these approaches, the team developed pop-up pilot installations at a selection of El-Spaces with diverse site conditions. The first pilot was implemented in Sunset Park, where the Gowanus Expressway separates much of the neighborhood from the waterfront and the multi-use Industry City complex.

In partnership with Industry City, this pilot utilized lighting and green infrastructure to enhance safety and increase environmental health and awareness. As part of the project, large copper chutes dynamically channeled stormwater from the overhead Expressway into Corten steel bioretention planters; the diverted runoff provided water for a

variety of low-light plants selected for their phytoremediation abilities. LED lighting on planter boxes and support structures brightened the space. A pedestrian walkway was defined with modular decking.

NYC DOT explored how similar above-ground green infrastructure systems could be retrofitted at other locations and environments where bioswales are not advisable. At the Rockaway Peninsula in Queens, NYC DOT partnered with the Rockaway Waterfront Alliance (RWA) to design a steel-edged “dunescape” planter that mimicked natural sand dunes at the nearby beach and contained native plants and seating. This pilot project served as an educational tool for RWA’s youth Shore Corps and Living Classroom programs, where participants learned about green infrastructure and resilient design through the planting, observation, and monitoring of the planter.

The “El-Space Toolkit” launched by NYC DOT and Design Trust for Public Space in 2020 presents information gained during test phases of the project and synthesizes lessons learned at each step of El-Space development. NYC DOT also created the “El-Kit,” a suite of replicable treatments for enhancing El-Spaces including the El-Box (a repurposed shipping container that can be used for retail, storage, or other creative purposes), piloted near the Brooklyn Bridge; the El-Fence (flexible fencing with LED lighting), piloted in Long Island City; and the CityEl (custom seating, lighting and signage installed around structural support columns).



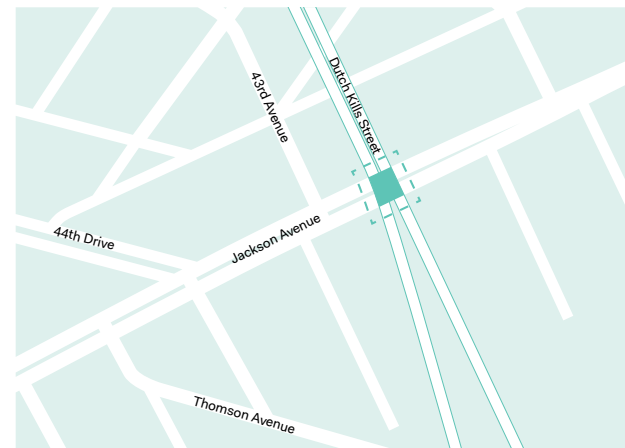
▲ Corten steel bioretention planters diverted runoff from the overhead Gowanus Expressway to a variety of low-light plants while they were installed in Sunset Park, Brooklyn.



- ▲ The green infrastructure piloted in Sunset Park activated the pedestrian walkway between the Industry City complex and the surrounding neighborhood.
- ▶ El-Box was piloted near the Brooklyn Bridge, where it temporarily served as a café kiosk.
- ▶ Rockaway Waterfront Alliance (now Rockaway Initiative for Sustainability and Equity) youth program participants plant native species within a "dunescape" planter that they designed in partnership with NYC DOT.

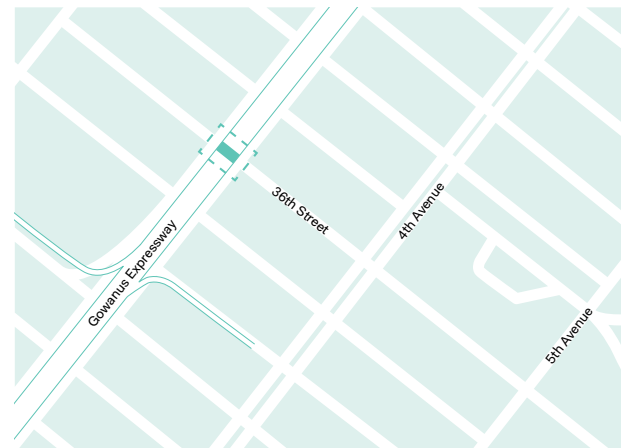
- ▶ An early pilot installation of the CityEI was created in partnership with Design Trust for Public Space and included custom seating wrapped around a structural support column.
- ▶ A subsequent prototype of the CityEI by Ciochini Design includes LED lighting and durable materials that match other New York City street furnishings.





Long Island City EI-Space, Queens

▲ The EI-Fence, piloted in Long Island City, Queens, is modular and allows for varying levels of transparency.



Sunset Park EI-Space, Brooklyn



▲ The colorful EI-Fence integrates LED lighting and brightens the sidewalk beneath Dutch Kills Street after sunset.

Key Facts

Approximately 300 linear miles of EI-Space exist in New York City, including seven distinct typologies of transportation infrastructure.

Most of New York City's elevated rail tracks were built between the late-1800s and the early-1900s.

New York City's elevated vehicular arterials were built between the 1930s and 1967, when the Bruckner Expressway was completed.

Elevated highways are significant sources of contaminated stormwater runoff and air pollutants.

Takeaways

EI-Spaces are underutilized resources.

Green infrastructure and lighting are useful strategies for activating EI-Spaces.

Toolkits and replicable strategies can be useful when addressing spaces with shared contexts.

Pop-ups and pilots can be used to experiment with design solutions in challenging locations.

Rockaway Wellness Way

Team: Rockaway Initiative for Sustainability and Equity (formerly the Rockaway Waterfront Alliance), NYC Department of Transportation

Location: Limited-use segments of Rockaway Freeway beneath Beach 60th Street Subway Station, Arverne, Queens, New York City, New York

Year: 2015–ongoing

Project Type: Interim corridor pilot

In 2015, the Rockaway Initiative for Sustainability and Equity (RISE) launched a community-led process to re-imagine and activate the roadbed under the elevated A train track—an underutilized space that bisects the Rockaway Peninsula. Called Project Underway, the initiative developed through a partnership with NYC DOT over multiple phases, and ultimately evolved into Wellness Way: a multiuse corridor that incorporates pedestrian and bicycle safety improvements alongside wellness-centered activities hosted by community partners. Funded by a National Association of City

Transportation Officials (NACTO) grant awarded at the onset of the pandemic, the Wellness Way pilot was installed at the El-Space adjacent to the Beach 60th Street subway station in the summer of 2020. The site was distinguished by a painted asphalt mural and programmed with activities that nurture holistic community wellness. A farm-share distribution for mixed-income residents provided healthy food; musical performances and public art installations offered a space for joy; and outdoor COVID-19 test sites supported critical public health goals.



▲ Pop-up lounge spaces helped to establish Wellness Way as a shaded space for neighbors to socialize and relax.



- ▲ Wellness Way includes a farm-share pick-up site for healthy food distribution.
- ▲ A painted asphalt mural transformed the limited-use segment of the Rockaway Freeway into a colorful shared space for pedestrians and cyclists.
- ▲ Outdoor COVID-19 test sites at Wellness Way support public health within the Rockaway community.

“We transformed an underutilized freeway into a safe haven for community engagement, entertainment, art, exercise, local produce, and health services. RISE will continue to build on the promise of Wellness Way through future challenges.”

— Jeanne DuPont, Executive Director, RISE Rockaway



▲ *Silent Lights* includes reactive LED fixtures that transform a sidewalk beneath the Brooklyn Queens Expressway into an interactive artwork.

Silent Lights

Team: NYC Department of Transportation's Art Program, Valeria Bianco, Shagun Singh, and Michelle Brick, Myrtle Avenue Brooklyn Partnership

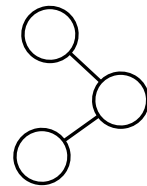
Location: Navy Street and Park Avenue, beneath the Brooklyn Queens Expressway, Brooklyn, New York City, New York

Year: 2013

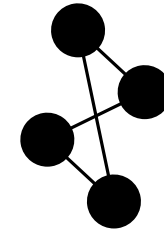
Project Type: Art installation

Pedestrians may perceive spaces under elevated structures as unsafe or undesirable to pass through at night, especially as such spaces often suffer from inadequate lighting. Through inventive installations, artists have helped brighten these spaces in exploratory ways, transforming them into interactive art pieces. With five structural doorways lining a pedestrian pathway beneath the Brooklyn

Queens Expressway, *Silent Lights* creatively calls attention to noise pollution by using reactive LED fixtures. The installation's colorful panels are illuminated by the sounds of traffic to reveal patterns alongside the noise, highlighting environmental conditions in challenging underway spaces while enhancing pedestrian safety.



Underpass Park



Team: PFS Studio, The Planning Partnership, Paul Raff Studio

Location: Beneath the Adelaide Street East, Eastern Avenue, and Richmond Street East overpasses, between Sumach Street and the Don River, Toronto, Ontario, Canada

Year: 2012

Project Type: Corridor capital project

East of downtown Toronto, near the intersection of two of Toronto's busiest arterials, a cluster of highway ramps and overpasses runs through an area known as the Don Lands. Situated within the formerly dark and unprogrammed sites beneath these viaducts, Underpass Park utilizes the transportation infrastructure as weather protection and activates the underway with flexible gathering and recreation spaces. A skate park, basketball courts, and play structures encourage activity for all ages. Meanwhile, *Mirage*, a sculpture by Paul Raff, comprises 57 octagonal reflective panels

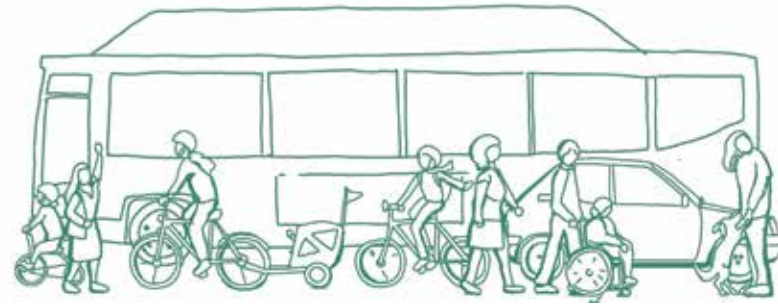
on the underside of the freeway structure, bouncing light and colors from adjacent artist murals and lighting installations around the concrete space. Tree groves and perennial grasses in open areas of the park slow stormwater runoff and redefine the area as a pleasant and welcoming pedestrian space. To date, Underpass Park has become a vibrant neighborhood amenity and a connector for the community. It has also served as proof of concept in the planning for subsequent underway spaces in the city, including The Bentway, a linear park beneath the Gardiner Expressway.



▲ Play structures and planted areas are situated beneath elevated arterials.

◀ Recreation spaces are surrounded by brightly colored artist murals, painted directly onto the concrete infrastructure.

6



Sharing the Street

Roadbeds play a necessary role as movers of people, goods, and services. However, they can also be designed and utilized to enhance public health by encouraging active transportation and physical activity, mitigating the heat-island effect, and reducing air pollution caused by gas-powered vehicles. Holistic street redesigns simultaneously address competing demands of the road, while prioritizing safety and management needs.

Balancing such a broad number of needs requires significant coordination across City agencies and may also necessitate an interim testing period to evaluate how designs work at specific sites. Since 2019, NYC DOT has piloted a limited number of shared streets at select locations with high pedestrian volumes, including near Flatiron Plaza/Worth Square and south of Union Square at University Place in Manhattan. These low-speed roadways are designed for all street users to share and cooperatively negotiate the right-of-way.

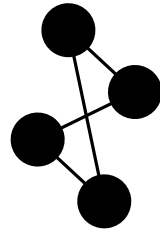
Whether through capital road renovations or community-based stewardship projects, measures to improve safety can have a positive impact on the community. Targeted design interventions that increase pedestrian comfort—including seating, crosswalk enhancement, bike racks, and improved signage—modify car-dominated environments into spaces for people. Increasing greenery along roadways can boost the pedestrian experience and address stormwater management. Projects that alter traffic patterns to prioritize safety and convenience for active transportation and public transit incentivize users to select these more sustainable options.

How can multiple types of use be facilitated by the design of our streets? And how can reimagining these public corridors as shared spaces enhance the safety, wellbeing, and experiences of all people?



A line of inset cobblestones delineates circulation zones intended for different modes of self-powered transportation.

Grand Concourse Reconstruction



Team: NYC Department of Transportation, NYC Department of Design and Construction, NYC Department of Environmental Protection

Location: Passes through West Concourse, Mount Hope, Fordham, Bedford Park, and Van Cortlandt Village, Bronx, New York City, New York

Year: 2006–ongoing

Project Type: Capital street reconstruction

Grand Concourse is a lively Bronx corridor known for its rich cultural and architectural history, as well as its reputation for traffic accidents involving pedestrians. The street was designed in the late 19th century with the vision of a grand boulevard, akin to the Champs-Élysées. However, the road took on the pace of an interstate highway, catering to traffic efficiency rather than pedestrian experience. Although the boulevard is a high-density residential and commercial corridor, green highway signs and low numbers of pedestrian walk signals were characteristics of the boulevard prior to renovations. The project area—which comprises the entire 5-mile stretch of the corridor—has accounted for 10% of pedestrian deaths and major injuries in the Bronx. NYC DOT first identified the need for renovating the corridor in the early 1990s, when twelve pedestrians were killed on the boulevard. The present reconstruction plan—expected to be fully completed in 2023—divides corridor work into four phases, working north from 161st Street to the end of the boulevard at Fordham Road.

Phase I was completed in 2008 and included reconstruction of the underpass at 161st Street, installation of bike lanes, and the conversion of a parking lot into Lou Gehrig Plaza. Work for Phase II (East 166th Street to East 171st Street) and Phase III (East 171st Street to East 175th Street) included resurfacing of the main roadway and the reconstruction and realignment of widened medians to create more space for planting pedestrian amenities. Phases II and III also continued the installation of a buffered bike lane on both sides of the street,

initiated in Phase I. Each phase included infrastructural and safety enhancements such as the addition of curb extensions and raised crosswalks, the replacement of street lighting and traffic signals, and new water mains and drainage improvements.

In 2014, New York City adopted the Vision Zero Policy, a commitment to protect New Yorkers from traffic fatalities. Since adopting the policy, City agencies have collaborated to improve regulations and street design to support this mission. As a part of Vision Zero, particularly dangerous roads, including Grand Concourse, were identified as priorities for Great Street renovations to improve safety. In addition to physical improvements, NYC DOT has lowered the speed limit on Grand Concourse and introduced a campaign to fight drunk driving in the area.

Subsequently, NYC DOT began community outreach for Phase IV of the project, which will continue efforts to rebuild and expand medians and modify traffic circulation throughout the corridor. The project will also add public artwork and improve planting and tree canopy to create a more hospitable environment for pedestrians (long-term maintenance agreements were established to ensure the longevity of the plantings). New lighting, bike racks, benches, and wayfinding signage will also improve pedestrian experience in line with the City's Vision Zero Great Streets goals to improve streetscape character and create a safer street for the Bronx. The Grand Concourse renovation is expected to be completed in 2023.



- ▲ Widened crosswalks with new trees and plantings create a friendlier pedestrian environment.
- ▶ Prior to the reconstruction, the Grand Concourse had broken pavement, narrow medians, and an unused asphalt lane along the service road.
- ▼ Street geometries are reconfigured to lengthen the merge between local service roads and the main roadway, reducing the likelihood for pedestrian conflicts.



▲ Before and After: East 161st Street at Grand Concourse was informally used for years as a parking area for the neighboring Bronx County Courthouse. In 2008, the parking area was transformed to a pedestrianized open space, Lou Gehrig Plaza.



Grand Concourse, Bronx

► The team added painted bicycle lanes and widened, planted medians with pedestrian refuges as part of the reconstruction.



“The Grand Concourse reconstruction has shown that traffic calming and pedestrian safety measures reduce injuries and fatalities. Lessons learned here are informing our other major Vision Zero projects, creating safer streetscapes across NYC.”

— Thomas Foley, Commissioner, NYC Department of Design and Construction

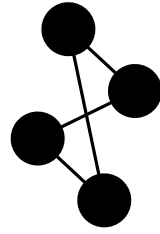
Key Facts

- Over 34,000 square yards of roadway have been repaved.
- Thirty-three pedestrian ramps were replaced, and 23 new, accessible ramps were installed.
- Following Phase I of the reconstruction, the total number of serious injuries on Grand Concourse Boulevard was reduced from 28 in 2014 to 4 in 2017.
- More than 95,000 square feet of sidewalk has been replaced along the boulevard.

Takeaways

- Prioritizing multimodal streets improves safety and improves daily quality of life.
- By reassigning traffic lanes to specific user groups, circulation can become more legible and efficient.
- Investing in upgraded water infrastructure can ensure safer, more accessible streets, as well as reliable service to local residents and businesses.
- By establishing a plan for continued maintenance, quality spaces can be enjoyed long into the future.

Queens Boulevard Great Street Transformation



Team: NYC Department of Transportation, NYC Department of Design and Construction, AECOM, NV5

Location: Queens Boulevard, Queens, New York City, New York

Year: 2016–ongoing

Project Type: Capital street reconstruction

Queens Boulevard has long been known as the “Boulevard of Death” due to its high pedestrian fatality rates. Seeking to address the corridor’s unpredictable traffic environment and inhospitable public realm, NYC DOT’s multi-phase Queens Boulevard Vision Zero project aims to end pedestrian injury on this infamous boulevard. Interim operational improvements, the addition of painted bike lanes, and modifications

to the street geometry have successfully decreased pedestrian injury by 55 percent. The permanent design will reconstruct raised malls to calm traffic, add protected bike lanes and a pedestrian path, and integrate mall-to-mall crossings and stop-controlled slip lanes. Landscaping, benches, lighting, and wayfinding will also be placed alongside the malls to alter the public realm, creating a safer and more comfortable pedestrian experience.



▲ As one of NYC DOT’s Vision Zero Great Streets, the agency has begun to add protected bike lanes, widened crosswalks, and extended medians.



- ▲ The reconstruction includes raised malls with pedestrian paths, bus shelters, and various public amenities.
- ◀ Central vehicular lanes are separated from outer roadways for local traffic, and curb extensions and pedestrian refuges shorten street crossing distances.
- ▼ Protected bike lanes will run alongside the planted pedestrian malls.





▲ The limitation of non-bus traffic along 14th Street has improved bus travel speeds along the corridor.

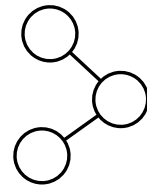
14th Street Busway

Team: NYC Department of Transportation, Metropolitan Transportation Authority

Location: 14th Street between Third Avenue and Ninth Avenue, Manhattan, New York City, New York

Year: 2019–ongoing

Project Type: Bus-priority lane



In October 2019, NYC DOT introduced a pilot project along a portion of the M14 busway on 14th Street to speed up the bus route, which had seen a decline in ridership. The bus-priority lane is in effect daily from 6 a.m. to 10 p.m.; during these hours exclusively buses and trucks may make through-trips. Other vehicles are limited to local trips, pick-up, or drop-off, and may utilize short-term metered loading zones for commercial loading and unloading. In 2019, after initial success in improving bus travel speed (up to a 24% increase) and ridership (as much as 30%), NYC DOT began to pilot a Transit and Truck Priority design in coordination with Select Bus Service on 14th Street to

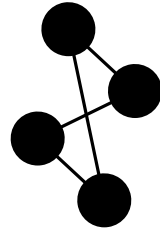
further boost bus speeds. This pilot project serves approximately 28,000 daily bus riders and combines blocks of exclusive access and bus lanes to prioritize bus operations from Ninth Avenue to First Avenue. And, as part of its Better Buses Restart initiative, NYC DOT continues to work closely with the Metropolitan Transportation Authority (MTA) and New York Police Department to increase bus travel efficiency, reliability, and ridership at other corridors throughout the five boroughs—particularly in communities with high concentrations of essential workers, where public transit is especially crucial as the City seeks to reopen amid the evolving pandemic.



▲ The reduction of vehicular traffic has allowed for the expansion of pedestrian space into the roadbed.
▶ NYC DOT and the Union Square Partnership BID commission artists to paint the sidewalk extensions along 14th Street annually as part of the agency's Asphalt Art Activations program.



The Brooklyn Waterfront Greenway



Team: Brooklyn Greenway Initiative, NYC Department of Transportation, Regional Plan Association, Michael Van Valkenburgh Associates, Sam Schwartz, Brooklyn Bridge Park

Location: Brooklyn, New York City, New York

Year: 2004–ongoing (planning and implementation phases)

Project Type: Pedestrian and bicycle pathway

In 2004, a neighborhood group, now known as the Brooklyn Greenway Initiative (BGI), developed a plan for the Brooklyn Greenway, a 26-mile landscaped pedestrian and bike path that connects New Yorkers to the waterfront while supporting the City's plans for coastal resilience. Over the past two decades, BGI has partnered with the Regional Plan Association (RPA) and NYC DOT to plan, design, implement, and program the Greenway. BGI also established the Adopt-a-Greenway program to foster long-term community stewardship, and it regularly hosts volunteer events and programs that promote the maintenance and use of the path and adjacent green spaces. The active role of residents generates community wellness and encourages use of the corridor. A particularly popular mile-long stretch of the Greenway runs through Brooklyn Bridge Park (BBP) and is the primary artery that connects park visitors to the BBP piers, which host various passive and active leisure and recreation

opportunities. Designed by Michael Van Valkenburgh Associates and Sam Schwartz, this segment of the Greenway maintains a consistent 12'-wide two-way bicycle path, separated from the pedestrian lane by a cobblestone strip. Clear wayfinding signage and surface markings legibly indicate where pedestrian crossings occur to minimize potential conflicts and facilitate safe recreation. A user survey conducted by Sam Schwartz indicated that on a summer weekend in 2018, approximately 8,500 pedestrians and 835 cyclists used this stretch of the Greenway on a weekday, and as many as 11,000 pedestrians and 2,000 cyclists used the same corridor on a Saturday. The Greenway has helped to facilitate BBP's transformation from a formerly dilapidated industrial waterfront to a vibrant, active landscape. More broadly, the Greenway's success has powerfully shown how shared streets can positively impact communities through a multitude of physical, social, and environmental benefits.



◀ Bike stamps and a cobblestone strip delineate a two-way bicycle path from pedestrian lanes and waterfront seating areas.



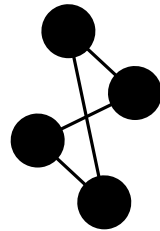
▲ Pedestrian-scale lighting allows for public use of the Greenway, even after the sun has set.

◀ Clear wayfinding signage is important near busy destinations, such as within Brooklyn Bridge Park, where it minimizes potential conflicts between pedestrians and cyclists.



▲ A raised bikeway and pedestrian path lead to the Brooklyn Bridge.

Tillary Street Reconstruction



Team: NYC Department of Transportation, NYC Department of Design and Construction, MNLA

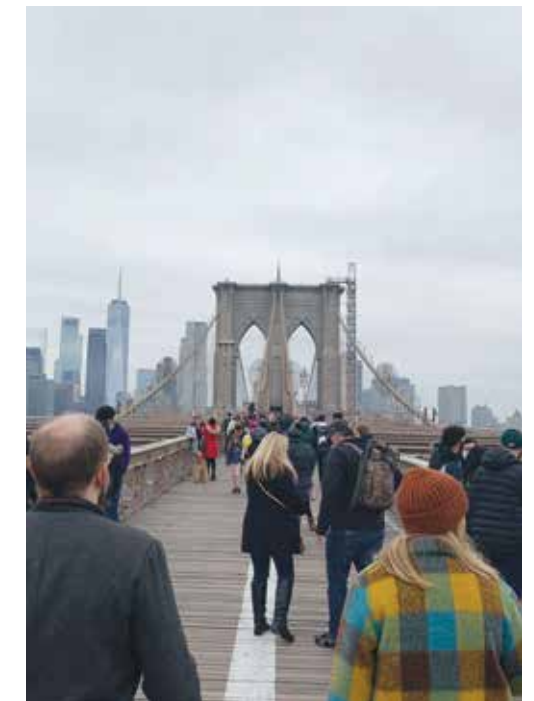
Location: Tillary Street Division between Downtown Brooklyn and Dumbo, Brooklyn, New York City, New York

Year: 2012

Project Type: Capital street reconstruction

At Brooklyn's primary gateway to the Brooklyn Bridge, this reconstruction has enhanced the pedestrian and bicycle experience of a highly trafficked intersection while creating a sense of arrival at the famed East River crossing. The project added a new two-way raised and protected bikeway, shared bicycle and pedestrian pathways, and new landscaped medians along the boulevard. The widening of sidewalks and a newly built-out plaza have created more space for the average of around 1,400 pedestrian crossings on a clear or partly cloudy day. The reassignment of traffic patterns and clarification of lane assignments also increased flexibility at

the bridge approach. In 2021, to reduce the amount of pedestrian and cyclist congestion (and the potential for conflicts) on the bridge's primary wood deck, a vehicular lane on the Brooklyn Bridge was converted to a two-way protected bike lane. In the first full month following this change, NYC DOT's cyclist count data showed an average of over 4,200 cyclists crossing the bridge—nearly 2,000 more rides than the year prior. This reconstruction turned a dangerous and chaotic choke point into a more stately approach befitting the grand passage between Manhattan and Downtown Brooklyn—and made it much safer to take an iconic Brooklyn Bridge selfie in the bargain.



▲ *Unity* by Hank Willis Thomas was commissioned in conjunction with New York City's Percent for Art process that was tied to the capital reconstruction of Tillary Street.

▲ A vehicular lane on the Brooklyn Bridge was converted to a two-way protected bike lane that connects bike routes between Brooklyn and Manhattan.

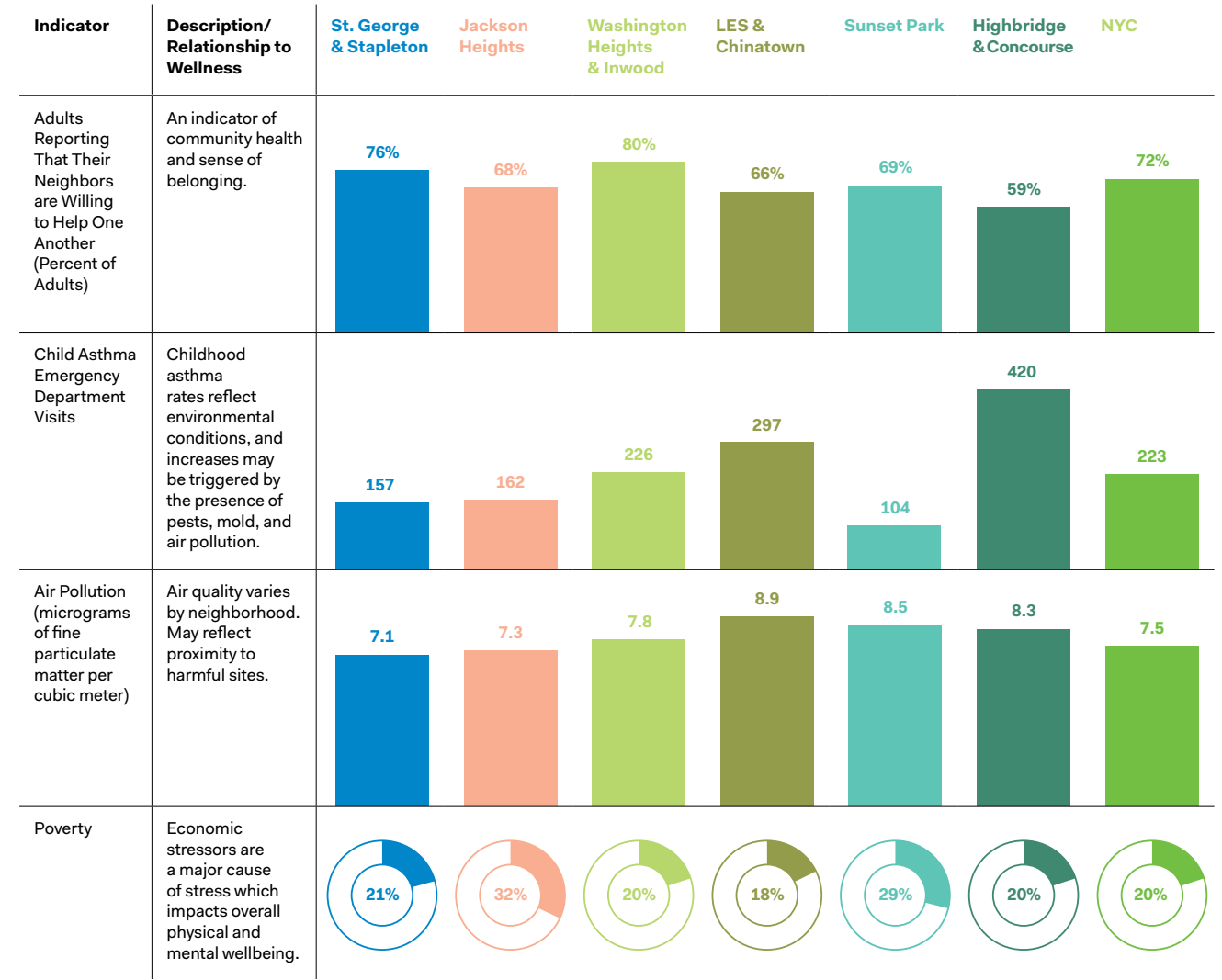
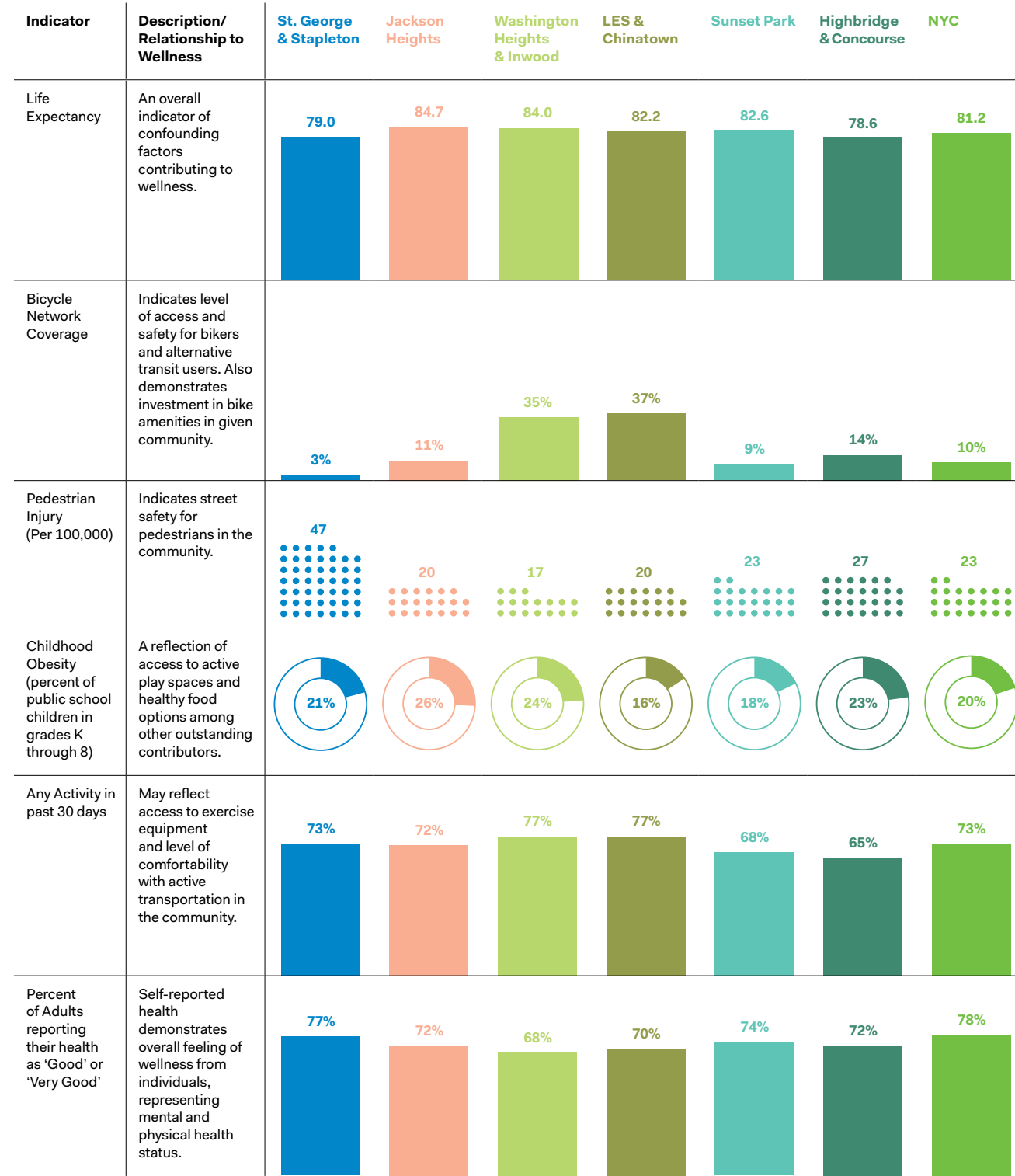
▲ Pedestrians cross the upper deck of the Brooklyn Bridge in 2021, following the diversion of cyclist traffic.

Appendix

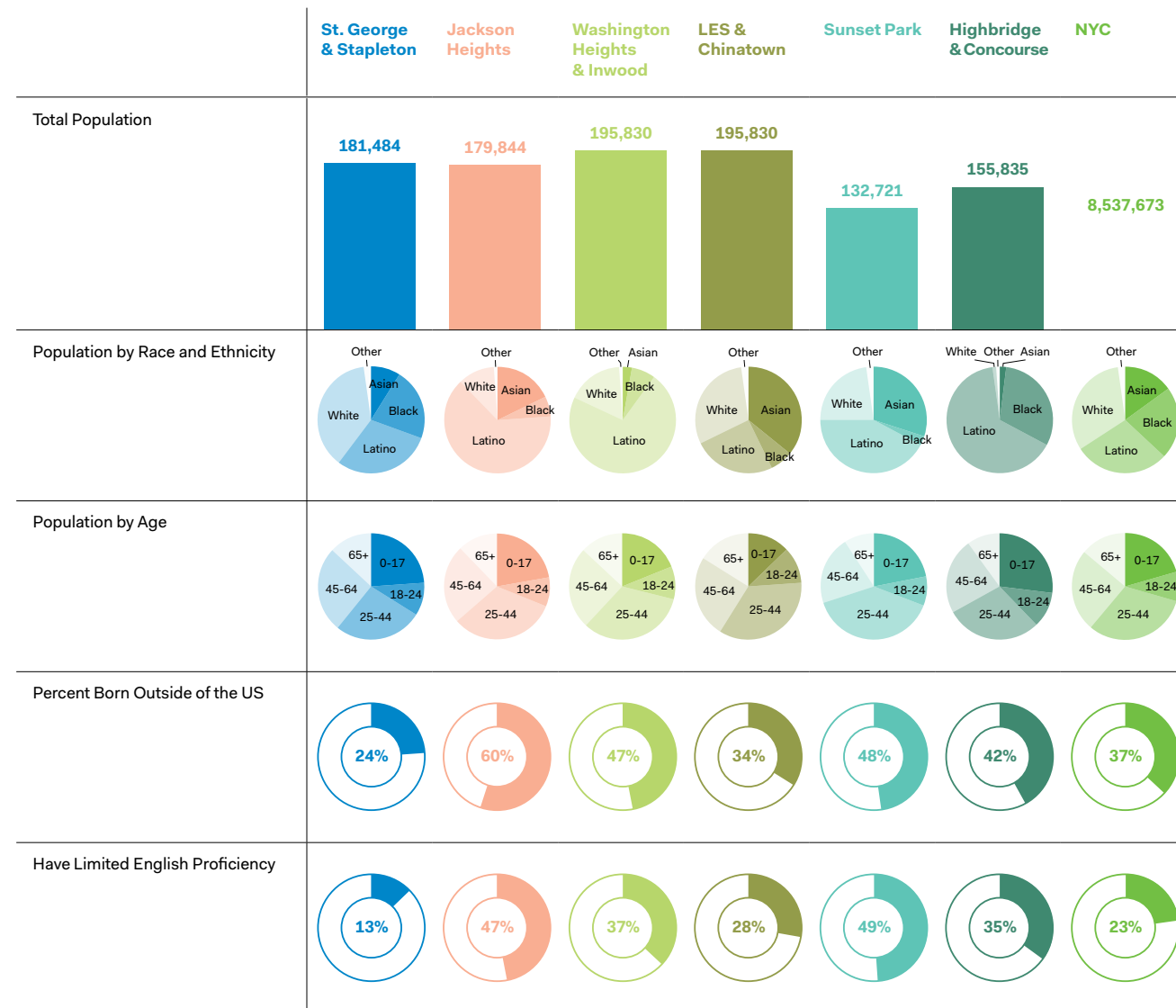


Streetscapes for wellness are accessible to people of all ages and abilities.

Community Health Profile



Community Demographics



Note: The preceding Community Health Profile and Community Demographics data are from the NYC Department of Health and Mental Hygiene's 2018 *New York City Community Health Profiles*.

Key Terms

The terms below are from the New York City Housing Authority (NYCHA) and NYC Planning *Connected Communities Guidebook*, the NYC Planning Principles of Good Urban Design Glossary, and the NYC DOHMH *Active Design Guidelines*—all invaluable public resources that relate to wellness within our public realm.

Access	The ability to make use of amenities and resources, such as grocery stores, pharmacies or schools, often within an easily traveled distance from where a person lives or works.
Accessibility (Ease of Movement)	A measure of how friendly and inviting an area is for moving around easily for people of all ages and physical abilities. Neighborhood accessibility is also measured by the distance and time it takes someone to go from one location to another. A shorter distance between blocks often means that a person is naturally able to experience more variety and therefore, may be willing to go longer distances.
Activation	Animating open spaces by creating opportunities for social activity. For example, playgrounds and sports fields can allow for activation of a park or lawn area. Activation can also be created through community events and other temporary programming.
Active Design	An applied, evidence-informed approach to leverage the expertise of architects, planners, developers, community members, designers, public health professionals and other stakeholders to improve physical, mental and social health outcomes through the design of the built environment.
Built Environment	The human-made structures that we live, work, and play in, ranging from buildings and infrastructure to parks and green spaces.
Capital Projects	Construction projects on or over City-owned grounds that are publicly funded to help improve or maintain them.
Civic Pride	The feeling of satisfaction and belonging in the local identity of a place; pride in one's city, neighborhood and/or community.
Community Engagement	The process that facilitates communication, interaction, involvement, and exchange between an organization and a community for a range of social and organizational outcomes.
Green Infrastructure	An approach to water management that protects, restores, or mimics the natural water cycle; frequently used to improve climate change resilience.
Heat Island Effect	Phenomenon that makes areas of a city hotter than their surroundings due to a lack of vegetation, retention of heat in building materials, or an expanse of paved surfaces, especially those that use dark materials, which absorb and retain heat.
Landscaping	Designing, creating or modifying the visible features of an open space.

Open Space	Areas that are public and accessible (i.e., streets, sidewalks, or public parks) or private with limited access (i.e., private streets, parks, or parking lots).
Participatory Design	Approach to design that attempts to actively involve all stakeholders in the design process to help ensure the result meets their needs and is usable. (see Community Engagement)
Pedestrian Perspective	The point of view or experience at eye level of a pedestrian when moving through a city or neighborhood. Urban designers focus on the pedestrian perspective when evaluating any aspect of a project or when designing a building, plaza or any other element of the public realm.
Public Open Space	Areas that are open to the public to use, such as streets and public parks.
Public Realm	The spaces and experiences that members of the public share within the built environment. For example, our streets, parks, and plazas are part of the public realm, and the public realm is also shaped by adjacent buildings.
Sense of Belonging	The feeling of connectedness to a place or community. This is important because if we feel recognized and connected to the place where we live, work and play in everyday, we feel more at ease and can thrive within that environment. It's through a sense of belonging that our built environment can improve our well-being and quality of life.
Sense of Scale	Scale refers to how elements of the city relate to each other in size or dimension and to how a pedestrian experiences them.
Urban Design	Urban design focuses on how the elements of our city, buildings, streets, parks, and plazas are designed, built, and arranged in relation to one another, and how people experience the city.
Urban Planning	Urban planning looks at how features of the city, think of buildings, transportation and infrastructure, open space, housing, and public buildings, connect and relate to one another to shape regulations and investments to promote the health, safety, and economic well-being of the city's residents, workers, and businesses, in the near term and into the future. Planning discussions combine the technical planning practice with the unique needs of our communities. Planners, who may work for government agencies, private entities, nonprofit organizations, or as volunteers, collaborate with communities, other public agencies, and elected officials, to define and address the unique needs, aspirations, and cultures of New York City neighborhoods and their residents.
Urban Design Principles	A set of values and broad goals identified to inform and guide the approach to the design of a building, open space or other aspect of the built environment.
Wellbeing	The degree to which individuals feel their physical, emotional and social needs are met. It includes all aspects of community life that have a direct influence on the physical and mental health of its members and the quality of the environment around them.

Resources

Other Publications in the Designing New York Series

Designing New York: Quality Affordable Housing. (2018). New York, NY: NYC Public Design Commission; American Institute of Architects New York Housing Committee; The Fine Arts Federation of New York.

Designing New York: Prefabrication in the Public Realm. (2020). New York, NY: NYC Public Design Commission; Columbia University Graduate School of Architecture, Planning and Preservation.

Select New York City Resources

Active Design Guidelines: Promoting Physical Activity and Health in Design. (2010). New York, NY: City of New York.

Connected Communities Guidebook. (2020). New York, NY: NYC Department of City Planning; New York City Housing Authority.

New York City Community Health Profiles. (2018). New York, NY: NYC Department of Health and Mental Hygiene, City of New York. (www.nyc.gov/site/doh/data/data-publications/profiles.page)

NYC DOT Street Design Manual, Third Edition. (2020). New York, NY: NYC Department of Transportation. (www.nycstreetdesign.info/)

Principles of Good Urban Design. (2022). New York, NY: NYC Department of City Planning. (goodurbandesign.nyc)

For additional design resources and publications from New York City Agencies and other organizations, please visit the Public Design Commission's digital library, which is accessible at: nyc.gov/designcommission

Citations

1. "About NYC DOT." (2022) New York, NY: NYC Department of Transportation, The City of New York. (www.nyc.gov/dot)
2. Norton, Peter D. (2007) "Street Rivals: Jaywalking and the Invention of the Motor Age Street." *Technology and Culture*, 48(2), 331-359. (<https://muse.jhu.edu/article/215409>)
3. Wallace, Mike. (2017) *Greater Gotham: A History of New York City from 1898 to 1919*. New York: Oxford University Press, Incorporated.
4. Caro, Robert A. (1974) *The Power Broker: Robert Moses and the Fall of New York*. New York: Knopf.
5. "Living Near Highways and Air Pollution." (2021) New York, NY: American Lung Association. (<https://www.lung.org/clean-air/outdoors/who-is-at-risk/highways>)
6. *The State of Poverty and Disadvantage in New York City, Volume 4*. (2021) New York: NY: Robin Hood Foundation. (https://robinhoodorg-wp-production.s3.amazonaws.com/uploads/2022/04/PT_Annual2021_final.pdf)
7. Jacobs, Jane. (1961) *The Death and Life of Great American Cities*. New York, NY: Vintage Books.
8. "New Yorkers and Their Cars." (2018) New York, NY: New York City Economic Development Corporation. (<https://edc.nyc/article/new-yorkers-and-their-cars>)
9. Sadik-Khan, Janette, and Seth Solomonow. (2016) *Streetfight: Handbook for an Urban Revolution*. New York, NY: Penguin Books.
10. *2020 American Community Survey 5-Year Estimates*. (2020) Washington, D.C.: U.S. Department of Commerce, Census Bureau. (www.census.gov/acs)
11. "Mental health." *Merriam-Webster Dictionary*, Merriam-Webster. (<https://www.merriam-webster.com/dictionary/mentalhealth>)
12. Ryan, Richard M. and Edward L. Deci. (2021) On Happiness and Human Potentials: A Review of Research on Hedonic and Eudaimonic Well-Being. *Annual Review of Psychology*, 52(1), 141-166.
13. Roe, Jenny and Layla McCay. (2021) *Restorative Cities: Urban Design for Mental Health and Wellbeing*. London: Bloomsbury Visual Arts, 5.
14. Roe and McCay, 14.
15. Roe and McCay, 4.
16. Dixon, Laura. (2018) How Bogotá's Cycling Superhighway Shaped a Generation. *Bloomberg CityLab*. (<https://www.bloomberg.com/news/articles/2018-10-02/bogot-s-ciclov-a-40-years-later-how-cycling-shaped-a-generation>)
17. Jennings, Viniece and Omoshalewa Bamkole. (2019) The Relationship between Social Cohesion and Urban Green Space: An Avenue for Health Promotion. *International Journal of Environmental Research and Public Health*. 16(3), 452. (<https://pubmed.ncbi.nlm.nih.gov/30720732/>)

Note: Information included in the preceding pages has been provided by New York City agency partners, project teams, contributors, and interviewees, unless otherwise noted.

Acknowledgments



City of New York

Honorable Eric Adams
Mayor

Maria Torres-Springer
Deputy Mayor for Economic and Workforce Development

Public Design Commission of the City of New York

Signe Nielsen
Former President, Landscape Architect

Philip E. Aarons
Vice President, Lay Member

Kenseth Armstead
Painter

Laurie Hawkinson
Architect

Karen Kiehl
Brooklyn Museum

Deborah Marton
Lay Member

Manuel Miranda
Lay Member

Susan Morgenthau
The New York Public Library

Ethel Sheffer
Mayor's Representative

Dr. Merry H. Tisch
The Metropolitan Museum of Art

Mary Valverde
Sculptor

Public Design Commission Staff

Sreoshy Banerjea
Executive Director

Grace Han
Senior Director

Jenna E. Miller
Deputy Director, Urban Design & Policy

Rebecca Macklis
Deputy Director, Architecture, Urban Design & Special Initiatives

Julianna Monjeau
Archivist & Senior Records Manager

Carolina Llano
Manager of Art, Conservation & Design

Mary Beth Betts
Tour Manager

Streetscapes for Wellness is a collaboration of the New York City Public Design Commission (PDC), the New York Chapter of the American Society of Landscape Architects (ASLA-NY), The Fine Arts Federation of New York (FAF), and the New York City Department of City Planning (NYC Planning) Urban Design Office, along with a steering committee of staff from a number of city agencies, including the New York City Department of Transportation (NYC DOT), Department of Health and Mental Hygiene (DOHMH), Department of Parks & Recreation (NYC Parks). The PDC greatly appreciates the time, input, insights, and support from these partners and the many designers, planners, community-based organizations, students, and stakeholders who contributed to this publication.

These public agencies, nonprofit organizations, and individuals represent a cross-section of the city's urban design, landscape architecture, design and planning professions and have assembled to bring a more equitable and healthful, quality-designed public realm to the people of New York City.

The PDC would also like to thank ASLA-NY and the Associates of the Art Commission for their generous contribution to this initiative.

Special Thanks

To the PDC's former executive directors, Justin Garrett Moore, for laying the groundwork for the *Designing New York* series and envisioning a publication devoted to the quality design of our public realm, and Keri Butler, for supporting the continuation of that vision.

To the many students and community members who participated in the Park(ing) Day community engagement activities that the *Streetscapes for Wellness* Publication Team and Advisory Committee hosted in New York City's Open Streets.

To all the people who continue to write about, design, pilot, implement, maintain, and advocate on behalf of safer, high-quality streets in our public realm—the PDC has continuously drawn inspiration for how to improve New York City's streetscapes from you.

Publication Team

Sreoshi Banerjea
Executive Director, NYC Public Design Commission

Keri Butler
Former Executive Director (2021–2022),
NYC Public Design Commission

Justin Garrett Moore
Former Executive Director (2016–2020),
NYC Public Design Commission

Jennifer Nitzky
Trustee, ASLA-NY;
Vice President, The Fine Arts Federation of New York

Jeff Byles
Former President, The Fine Arts Federation of New York

Erick Gregory
Chief Urban Designer & Director, Urban Design Office,
NYC Department of City Planning

Author and Project Lead
Jenna E. Miller
Deputy Director, Urban Design & Policy,
NYC Public Design Commission

Public Realm Research Associate
Ariella Levitch

Lead Illustrator and Research
Julien Sneck
Senior Urban Designer, Urban Design Office,
NYC Department of City Planning

Illustration Team
Carsten Rodin
Senior Lead Computational Designer

with interns and fellows Karen Chen, Rudransh Dikshit, Lucas Gelfond, Yonghao Hu, and Carry Pak

Urban Design Office, NYC Department of City Planning

Graphic Design
MGMT. design

Advisory Committee

Diane Sferazza Katz
Executive Director, ASLA-NY

Simeon Bankoff
President, The Fine Arts Federation of New York

Alison Duncan
Vice President, The Fine Arts Federation of New York

Renée Schoonbeek
Board Member, The Fine Arts Federation of New York

Elizabeth Moskalenko
President, ASLA-NY

Sandra Nam Cioffi
Board Member, ASLA-NY

Kimberly Tryba
Board Member, ASLA-NY

Steven Handel
Member, ASLA-NY

Shigeo Kawasaki
Member, ASLA-NY

Sara Reinstein
Member, ASLA-NY

New York City Agency Steering Committee

Department of City Planning
Eugenia Di Girolamo, Crystal Jane Eksi, Erick Gregory,
Julien Sneck, and the Borough Urban Designers Group

Department of Cultural Affairs
Kendal Henry

Department of Design and Construction
Michaela Metcalfe and Becky Yurek

Department of Education
Alice Goodman

Department of Environmental Protection
Alicia West

Department of Health and Mental Hygiene
Kelly Cheung, Tanya Gomez, Evelyn Haguisan, Joshua Langham,
and Jack Wong

Department of Information Technology & Telecommunications
Brett Sikoff

Department of Parks & Recreation
Sheena Brown, Michael Kralovich, David McConnell, Nick Molinari,
Nancy Prince, Lindsay Quartini, Judy Tung

Department of Transportation
Roderick Barnes, Neil Gagliardi, Kyle Gorman, Claudia Mezey,
Nick Pettinati, Emily Weidenhof, and Christina Yoo

Economic Development Corporation
Sreoshi Banerjea, Yvi McEvilly, and Blake Montieth

Landmarks Preservation Commission
Jared Knowles

Mayor’s Office of the Chief Technology Officer
Jen Noborikawa

Mayor’s Office to End Domestic and Gender-Based Violence
Tesa Arozqueta, Taylor Blackston, Sara Gonzalez, Safia Mahjebin

Mayor’s Office of Environmental Remediation
Lee Ilan and Michelle Sarro

Mayor’s Office for People with Disabilities
Kleo King and Hassan Mamun

New York City Housing Authority
Vaidehi Mody and Delma Palma

New York Police Department
Sergeant Martin Wingert

Note: The Steering Committee convened in early 2021 and was instrumental in shaping the research themes pursued in this publication. Specific agency affiliations may no longer be accurate upon publication because of staffing changes.

Contributors and Interviewees

A+A+A Studio
Andrea Chiney, Arianna Deane, and Ashley Kuo

Brooklyn Bridge Park
Eliza Perkins

Center for Active Design
Suzanne Nienaber

Brownsville Community Justice Center
Jameika Bristol and Ionna Jimenez

Columbia University Center for Resilient Cities and Landscapes
Johanna R. Lovecchio and Thaddeus Pawlowski

Columbia World Projects
Abigail Anderson, Thomas Asher, and Hillary L. Schrenell

Design for Six Feet
Kaja Kühl, Anna Dietzsch and Liz McEnany

Futures Ignite (formerly Friends of WHEELS)
Génesis Abreu, Molly Delano, and the students of WHEELS

Hester Street
Isella Ramirez and Jimena Veloz

Institute for Transportation & Development Policy
Michael Kodransky

Interboro
Tobias Armbrorst, Daniel D’Oca, Joe Giambri, Georine Pierre,
Georgeen Theodore, and Andrew Wald

Open Plans
Jackson Chabot

PFS Studio
Sara Chiesa

The Police Athletic League
Marcel Braithwaite

RISE Rockaway
Jeanne DuPont

SO-IL
Jing Liu and Emma Silverblatt

SPUR
Shin-pei Tsay, Michelle Huttenhoff, and Alicia John-Baptiste

Street Lab
Leslie Davol and Sam Davol

Uptown Grand Central
Carey King

Van Alen Institute
Deborah Marton

WIP Collaborative
Bryony Roberts, Abby Coover, Sera Ghadaki, Sonya Gimon,
Lindsay Harkema, Elsa Ponce, and Ryan Brooke Thomas

WXY Studio
David Vega-Barachowitz and Amy Hau

Youth Design Center
Brittany Bellinger and Quardean Lewis-Allen

Image Credits

Cover

Photo courtesy of Street Lab

Inside Covers

Illustration by Julien Sneck and Yonghao Hu, NYC Planning

Mayor's Letter

p. 4, Photo courtesy of Street Lab

Deputy Mayor's Letter

p. 7, Photo courtesy of NYC DOT

Introduction

Corridors for Connection

p. 10, Photo courtesy of NYC DOT

Streets for People

p. 11, Photo courtesy of NYC DOT

About this Publication

About Streetscapes for Wellness

p. 12, Photo by DJ Creole, courtesy of Kuki Go and WXY

Wellness Redefined

p. 16, Photo courtesy of NYC DOT

p. 16, Photo by Vivar Photo, courtesy of Uptown Grand Central

p. 18, Photo courtesy of Justin Garrett Moore

p. 19, Photo courtesy of NYC Parks

Whose Wellness Are We Talking About?

pp. 20–21, Photos courtesy of Jenna E. Miller

What's In a Street?

pp. 24–31, Illustrations by Julien Sneck with NYC Planning Urban Design illustration team, in collaboration with Jenna E. Miller

Case Studies

pp. 34–35, Map by Jenna E. Miller

pp. 36, 48, 62, 74, 86, 98, Case Study Chapter Illustrations by

Julien Sneck with NYC Planning Urban Design illustration team,

in collaboration with Jenna E. Miller

Open Streets

p. 37, Photo courtesy of NYC DOT

NYC Open Streets

p. 39, Photo courtesy of NYC DOT

p. 40, Photo courtesy of Jenna E. Miller

p. 41, Photo courtesy of Marcus Meets Malcolm

p. 41, Photo courtesy of Jackson Chabot, Open Plans

p. 42, Photo by DJ Creole, courtesy of Kuki Go and WXY

p. 42, Photo courtesy of WXY

pp. 42, 43, Photo courtesy of Jackson Chabot, Open Plans

NYC Play Streets

p. 44, Photo by Dith Pran, courtesy of the Police Athletic League and the Morgenthau family

The Refreshing Waters

p. 45, Photo by Dean Kaufman, courtesy of NYC Department of Health and Mental Hygiene

Street Lab

pp. 46, 47, Photos courtesy of Street Lab

Collaborative Recovery

p. 49, Photo by Camille Esquivel, courtesy of A+A+A

Neighborhoods Now

p. 51, Photo courtesy of Urban Design Forum

p. 51, Photo courtesy of SO-IL

p. 52, Illustrations courtesy of SO-IL

pp. 53–54, Photos courtesy of SO-IL

p. 55, Photo by Sam Lahoz, courtesy of Urban Design Forum

p. 55, Photos courtesy of SO-IL

Design for Play

p. 56, Photo by Kaja Kühn, courtesy of Design for Six Feet

p. 57, Photo by Kathy Lawrence, courtesy of Design for Six Feet

p. 57, Photo by Kaja Kühn, courtesy of Design for Six Feet

Healing Spaces

p. 59, Photo courtesy of A+A+A

p. 59, Photo by Camille Esquivel, courtesy of A+A+A

Restorative Ground

pp. 60–61, Photos courtesy of WIP Collaborative and Hudson Square Properties

Streets for Justice

p. 63, Photo by Cristobal Vivar, courtesy of Uptown Grand Central

Clean Air Green Corridor

p. 65, Photo courtesy of WHEELS and Futures Ignite

p. 65, Photo courtesy of Jackson Chabot, Open Plans

p. 66, Illustration courtesy of WHEELS and Futures Ignite

p. 67, Photo courtesy of WHEELS and Futures Ignite

p. 68, Photo courtesy of Jennifer Nitzky

p. 68, Illustration courtesy of WHEELS and Futures Ignite

p. 68, Photo courtesy of Jennifer Nitzky

p. 69, Illustration courtesy of WHEELS and Futures Ignite

BLM Mural

p. 70, Photo by Nightnurse, courtesy of WXY

Coexistence Toolkit

p. 71, Illustration courtesy of SPUR and Gehl

p. 72, Photo courtesy of Uptown Grand Central

Food Access

p. 73, Photo courtesy of Uptown Grand Central

p. 73, Photo courtesy of Jenna E. Miller

Parks, Plazas, and Peripheries

p. 75, Photo courtesy of NYC Parks

Seward Park

p. 77, Photo by Shastine Van Vugt, courtesy of NYC Parks

p. 77, Photo by Chris Crowley, courtesy of NYC Parks

p. 78, Photos by Shastine Van Vugt, courtesy of NYC Parks

p. 79, Photo courtesy of Jennifer Nitzky

Richmond Terrace Wetlands

pp. 80–81, Photo courtesy of NYC Parks

Prospect Park Perimeter

p. 82, Rendering courtesy of NYC Parks and Prospect Park Alliance

Greenacre Park

p. 83, Photo courtesy of Jenna E. Miller

Hugh J. Grant Circle and Virginia Park

p. 84, Photo courtesy of NV5

p. 85, Photos by Tristan Porto, courtesy of NYC Parks

Under the Elevated

p. 87, Photo ©Brett Hitchens, courtesy of PFS Studio

EI-Space

pp. 89, 90, Photo courtesy of NYC DOT

p. 90, Photo courtesy of NYC DOT and Design Trust for Public Space

p. 91, Photo courtesy of NYC DOT and Design Trust for Public Space

pp. 91, 92, 93, Photos courtesy of NYC DOT

Wellness Way

p. 94–95, Photos courtesy of NYC DOT

Silent Lights

p. 96, Photo courtesy of NYC DOT

Underpass Park

p. 97, Photo by Tom Arban, courtesy of PFS Studio

p. 97, Photo ©Brett Hitchens, courtesy of PFS Studio

Sharing the Street

p. 99, Photo courtesy of Brooklyn Bridge Park, by Alexa Hoyer

Grand Concourse

p. 101, Photo courtesy of NYC Department of Design

and Construction (DDC)

p. 101, Photo courtesy of NYC DOT

p. 101, Photo courtesy of NYC DDC

p. 102, Photos courtesy of NYC DOT

p. 103, Photo courtesy of NYC DDC

Queens Boulevard

p. 104, Photo courtesy of NYC DOT

p. 105, Renderings by AECOM and NV5, courtesy of NYC DOT

and NYC DDC

14th Street Busway

p. 106, Photo courtesy of NYC DOT

p. 107, Photo courtesy of Jenna E. Miller

p. 107, Photo courtesy of Jackson Chabot, Open Plans

Brooklyn Waterfront Greenway

p. 108–109, Photos courtesy of Brooklyn Bridge Park, by Alexa Hoyer

Tillary Street

p. 110, Photo courtesy of NYC DOT and NYC DDC

p. 111, Photo courtesy of NYC DOT and NYC DDC

p. 111, Photo courtesy of NYC DOT

p. 111, Photo courtesy of Jenna E. Miller

Appendix

p. 112, Photo courtesy of Jenna E. Miller

pp. 114–116, Infographics by MGMT. design

pp. 126–127, Photo courtesy of NYC DOT



Community members relax in a streetscape parklet at Broadway near East 20th Street in Manhattan.

“Our streetscapes are open spaces that functioned as a lifeline to many New Yorkers and small businesses during the pandemic. We must continue to inspire creative placemaking on streets to help make NYC more equitable and accessible for all.”

— Sreoshy Banerjea, Executive Director, NYC Public Design Commission
