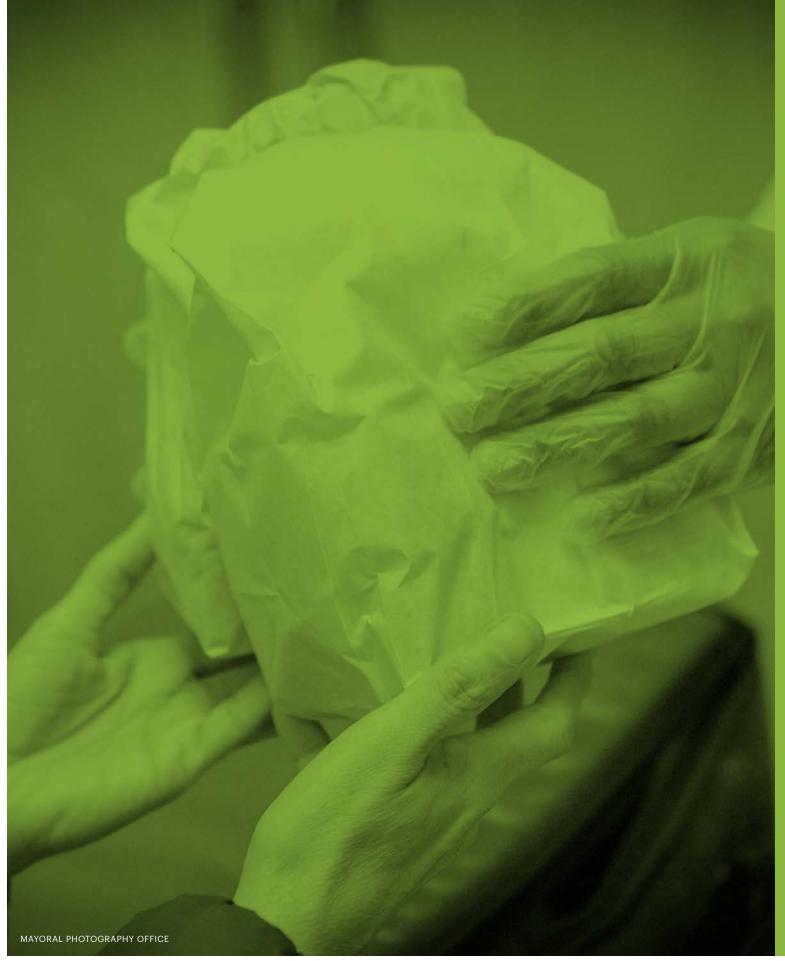


FOOD FORWARD BY CE: A 10-YEAR FOOD POLICY PLAN



Food Policy

February 2021



- Letter from the Mayor

 Letter from the Director of the Office of Food Policy

 Executive Summary

 STRATEGIES

 GOAL 1

 All New Yorkers have multiple ways to access healthy, affordable and culturally appropriate food

 GOAL 2
- New York City's food economy drives economic opportunity and provides good jobs

 57 GOAL 3
 - The supply chains that feed New York City are modern, efficient and resilient
- New York City's food is produced, distributed, and disposed of sustainably
- Support the systems and knowledge to implement the 10-year food policy plan
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Friends,

In seven years, we have come a long way in making New York the most livable big city in America, and every day, thousands of workers rise to the challenge of making our home safer, fairer, and healthier.

It should go without saying that in a truly great city, no one should ever go hungry. But beyond tackling hunger, we are also committed to ensuring that all New Yorkers have the information, tools, and access to eat healthy food and learn about nutrition; to lift up food workers and reduce food waste; and to back local businesses and urban farming, among a host of other responsibilities.

New York's free school lunch program, a budget increase to the baseline of the Emergency Food Assistance Program, and unprecedented rally to feed vulnerable New Yorkers amid the COVID-19 pandemic all speak to our commitment to sound food policy. And that kind of policy requires constant and careful review and strategizing, which makes this 10-year food policy plan such an invaluable tool.

From the inception of a regional food working group and a new food access program in low-income areas, to concerted efforts to reduce red tape and increase transparency and accountability in the City's food procurement, the Mayor's Office of Food Policy is working on a host of ideas that build on an already solid foundation.

Thanks to these measures, more and more New Yorkers will have access to healthy, affordable, and culturally appropriate food; supply chains will become even more modern, efficient, and resilient; food production, distribution, and disposal will become more sustainable; and the post-pandemic recovery of our world-famous food economy will drive economic opportunity and generate good-paying jobs.

On behalf of 8.6 million New Yorkers, I thank Director Kate MacKenzie and the Office of Food Policy for their tireless and innovative work in putting together this plan and, every day, helping keep our city well-fed and healthy.

Best,

MAYOR BILL DE BLASIO



Dear fellow New Yorkers,

There is no time more important than now to issue Food Forward NYC, the City's first ever 10-year food policy plan. At this moment in 2021, the city is in the grips of the COVID-19 pandemic, which has resulted in extraordinary levels of food insecurity. Yet, through these harrowing months, we have deepened our understanding of how essential our food workers are to our food system. From the farm workers who grow our food, to the drivers and store clerks who ensure our grocery stores and bodegas remain stocked, the delivery workers who bring food to our homes, the cafeteria workers who keep our students fed, the volunteers distributing food at pantries – we see you and we thank you.

Within City government, our understanding of these interconnections has become much stronger in the last 10 months, informing our strategy and approach. From federal benefits to infrastructure to waste to workforce development, the breadth of City agency involvement in food policy is remarkable. This plan takes that work even further by laying out the City's first strategic framework to guide us as we build a more equitable, sustainable, and healthy food system over the next decade. Food policy is no longer just about the food on our plates, but about the entirety of the food system.

Food Forward NYC is not simply a government roadmap. It will require participation from academic and health institutions, private for-profit and philanthropic partners, community-based organizations, labor organizations, advocates, and everyday residents. Through this collective effort, we will advance food democracy.

To advance the plan, the Mayor's Office of Food Policy will issue a report every two years outlining the progress made on each goal. We are committed to working with partners across the food system to identify appropriate indicators of success.

I want to thank Mayor de Blasio, all of the Deputy Mayors, the many City staff, and the hundreds of community voices that helped shape this plan.

Now, let's roll up our sleeves and get to work!

Roet

KATE MACKENZIE MS, RD DIRECTOR, NYC MAYOR'S OFFICE OF FOOD POLICY



EXECUTIVE SUMMARY

Food Forward NYC is the City's first ever 10-year food policy plan, laying out an ambitious interagency policy framework to reach a more equitable, sustainable, and healthy food system by 2031.

Food matters. Access to affordable, high-quality food is a fundamental human right and New York City's food system is foundational to its economy. While the City's food system delivers a vast array of foods that cater to every possible culture, dietary need and preference, it also faces many challenges. The fragmented nature of the food system means that too many people lack access to affordable, healthy foods; food businesses and other organizations struggle to operate profitably; food workers face challenging labor conditions; and the supply chains that feed New Yorkers are opaque and inefficient.

In Food Forward NYC, the Mayor's Office of Food Policy (MOFP) is putting forth an ambitious yet achievable plan to address these challenges. Just about every strategy in the plan will require creative collaboration between multiple stakeholders to bring forth real change. Some of these collaborations - such as the implementation of Good Food Purchasing - are already underway. Others will take additional work to launch.

Racial equity is central to this plan, deeply influenced by the work of the Racial Inclusion and Equity Task Force convened as a result of the COVID-19 pandemic. The implementation of the Good Food Purchasing Program - a national initiative that brings transparency and equity to institutional food purchasing - is also an impetus behind many strategies in the plan.

Finally, and perhaps most importantly, MOFP heard repeatedly from stakeholders about how much they valued more transparency and participation in government decision making. Hence, setting new governance mechanisms and enhancing democracy is a critical pillar of the plan.

NYC'S 10-YEAR FOOD POLICY PLAN

Food Forward NYC at a Glance

This plan is organized around 5 goals and 14 strategies that confront today's challenges and seize opportunities to improve the food system:

appropriate food. Nearly 1.6 million New Yorkers - one in five - are facing food insecurity. All New Yorkers should have multiple ways to access healthy, affordable, and culturally appropriate food, whether it is at school, at their local grocery store or bodega, using farmers' markets or getting online food delivery. Strategies include:

All New Yorkers have multiple ways to access healthy, affordable, and culturally

GOAL 1

- A. Expanding food benefits to reach more New Yorkers in more places, including being able to use SNAP online and partnering with health systems.
- **B.** Distributing food more equitably including expanding cold storage in low served areas and increasing supports for breastfeeding parents.
- C. Reconfiguring how the City sources food including seeking legislative change to incorporate social policy goals into food procurement and exploring purchasing innovations such as shared kitchens.

GOAL 2

New York City's food economy drives economic opportunity and provides good jobs. New York City's extraordinarily diverse food system depends on tens of thousands of small businesses and the hundreds of thousands of workers who work in them. To truly transform the city's food system, both food workers and food businesses deserve better

support systems. Strategies include:

- A. Strengthening protections for food workers, exploring innovative ways to improve pay and benefits, and supporting business conversions to worker ownership models.
- B. Supporting small food businesses by streamlining regulations and enforcement processes and supporting innovation.
- C. Training the next generation of food workers for high-quality jobs that offer career paths in the food sector.

GUAL 3

The supply chains that feed New York City are modern, efficient, and resilient.

Foundational to the success of the food policy plan is the creation of infrastructure for sustainable and equitable food production and distribution. This means both strengthening the city's own food infrastructure, including not only food distribution but also farming; and both acknowledging and strengthening regional connections. Strategies include:

- A. Investing in infrastructure by supporting the development of borough and neighborhood-based food hubs and strengthening the city's Industrial Business Zones.
- B. Improving regional coordination and sourcing and promoting the creation of regional food aggregation centers.
- **C.** Supporting increased urban farming including new spaces for urban farming.

New York City's food is produced, distributed, and disposed of sustainably.

The city's vast food system impacts local, regional, and global environments and has profound influences on animal welfare. The plan recognizes that addressing these impacts would require interventions at every stage of our food's lifecycle and includes strategies and partnerships to intervene at every step of the way. The strategies also address the unequal environmental impacts the food system imposes, particularly on communities of color in New York City. Strategies include:

GOAL 4

- A. Integrating sustainability and animal welfare into City food programs, including incorporating sustainability into commercial waste zone contracts and exploring ways to integrate sustainability and animal welfare into City food procurement.
- B. Reducing in-city air pollution and greenhouse gas emissions from the food system, and reducing unequal environmental impacts, by focusing on cleaner transportation and improving cold storage.
- **C.** Promoting community and business innovation around food and sustainability.

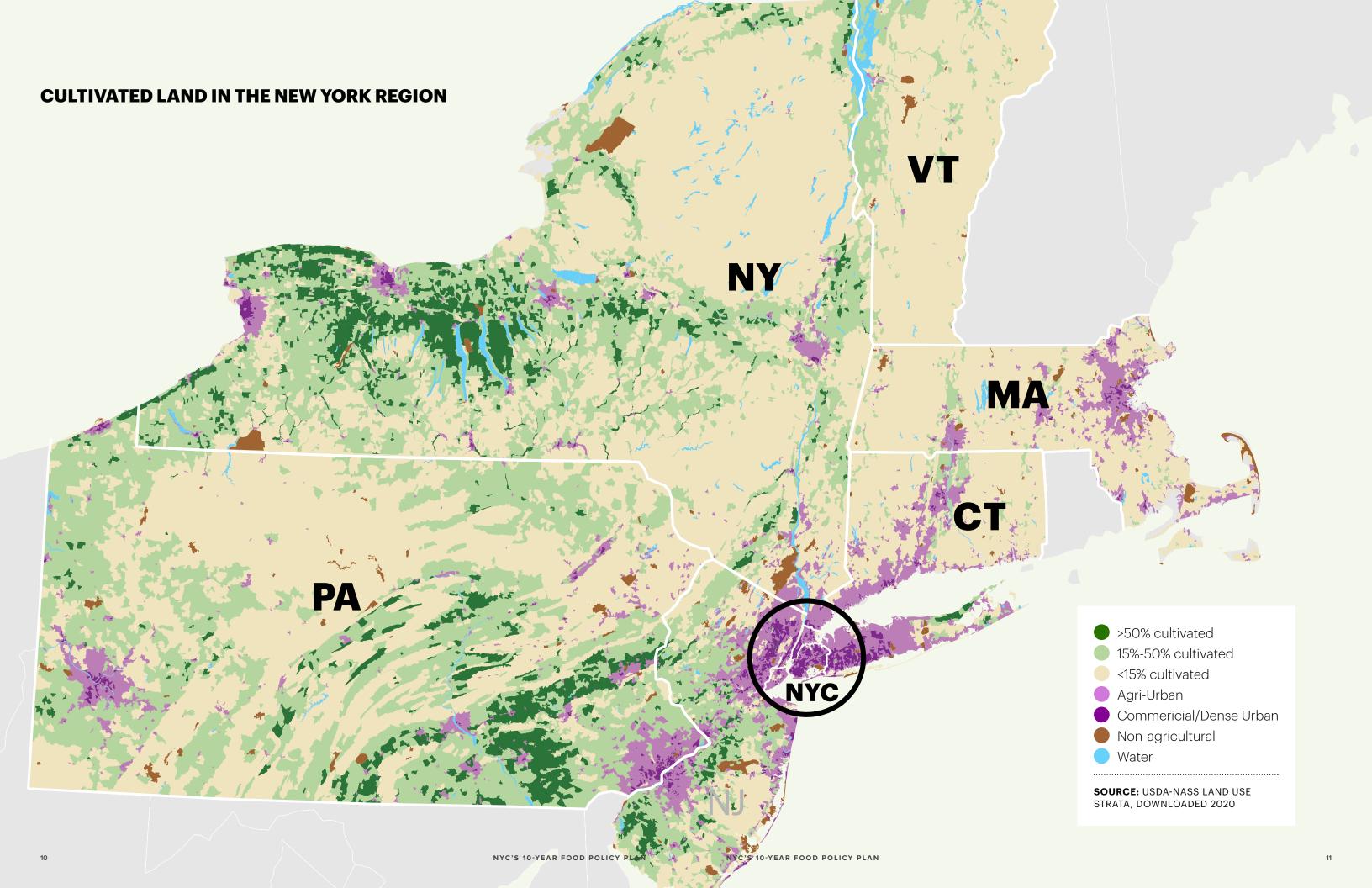
Support the systems and knowledge to implement the 10-year food policy plan.

A defining piece of the plan is its emphasis on expanding knowledge and systems support across the City. Both increased awareness of the food system and dedicated support need to be in place to ensure that the plan's policies are implemented successfully and achieve impact across multiple dimensions. Strategies include:

GOAL 5

- A. Strengthening community engagement and cross-sector coordination around the development and implementation of food policy including launching a NYC-regional food working group.
- B. Creating and sharing knowledge about the food system, including the development of enhanced food insecurity measures and the sharing of City procurement data.

To truly have a transformative impact on the food system, the City cannot go this alone. The success of this plan depends on the partnership of everyone involved in the food system. Food businesses large and small, community-based organizations and advocates, philanthropies and academic institutions, regional partners and the state and federal government all have a critical role to play. As the City seeks to implement this plan, it will work with partners to make the policies and strategies in this document their own and to implement them in ways that reflect their vision for their communities.





WHY FOOD POLICY MATTERS

New York City's food system touches the life of every New Yorker every day. The choices we will make about our food system over the next 10 years will be critical to building a more equitable, sustainable, and resilient New York City.

The essential role that food plays in the life of our city is manifold:

FOOD IS CULTURE.

Food is so often how families and friends connect with one another, how cultural experiences and values are transferred across generations, and what animates the "New York experience" for residents and visitors alike. Food is an important tool for community building and for creating cultural and environmental awareness and acceptance.

FOOD IS HEALTH.

Access to nutritious food is foundational to physical and mental health. Common chronic health conditions such as hypertension and diabetes are strongly associated with an unhealthy diet and with lack of access to healthy, affordable foods. The stresses of food insecurity also impair disease management. Additionally, the transportation of food can also impact health. The vast majority of food in NYC is moved by truck, resulting in air pollution that contributes to asthma and other ailments.

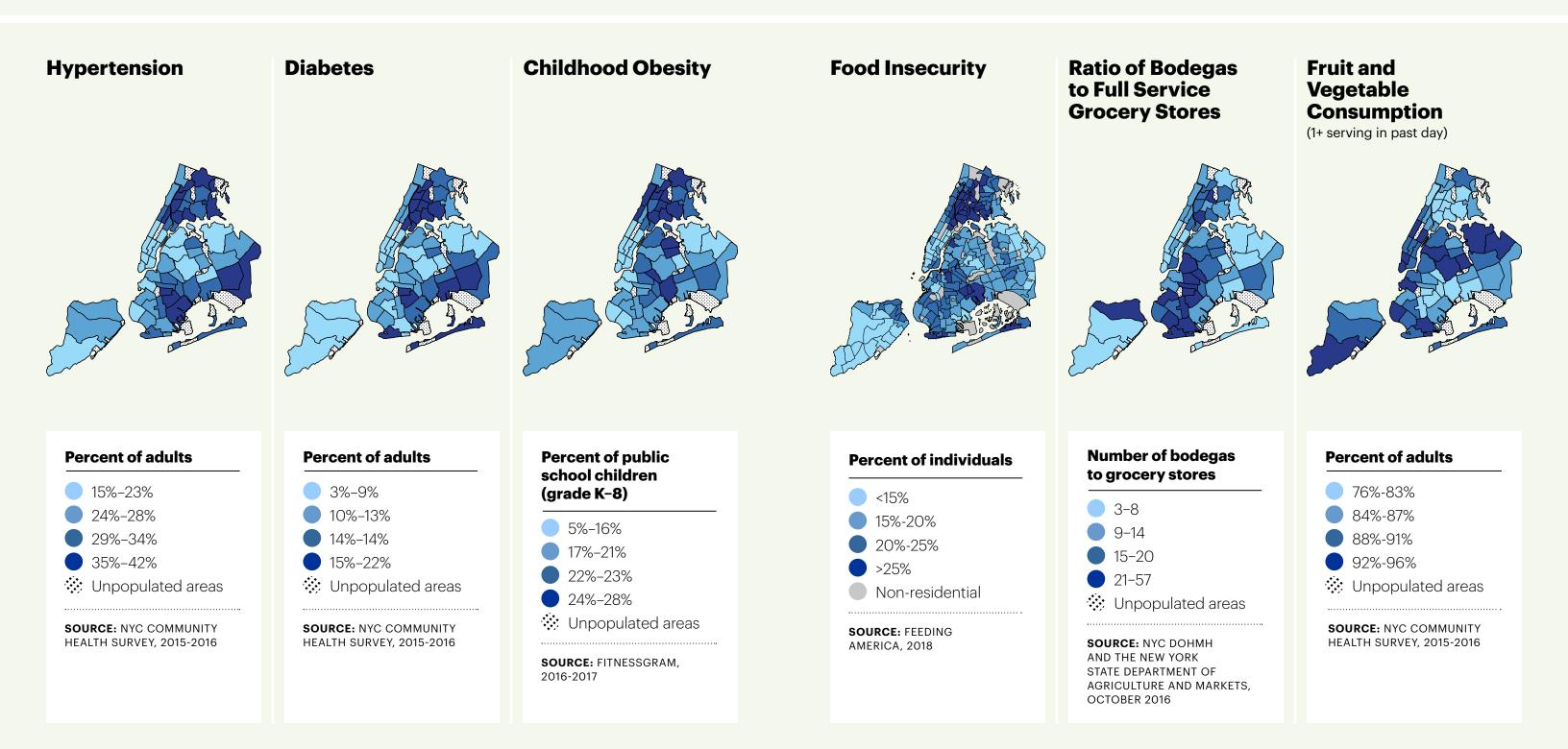
FOOD CREATES JOBS.

NYC's food economy supports an estimated 500,000 jobs, from line cooks and warehouse packers to street vendors and delivery workers. It also supports more than 40,000 businesses, the vast majority of them small and independently owned. Working in the food sector and owning a small food business have long been important ways for immigrants to gain employment and build wealth. Food businesses are also vital to the broader economy, serving as a draw for residents, workers, and visitors alike, as well as activating commercial corridors.

NYC'S 10-YEAR FOOD POLICY PLAN

THE CONNECTION BETWEEN FOOD AND HEALTH

Across New York City, rates of obesity, diabetes, and hypertension – conditions strongly tied to the consumption of unhealthy foods and beverages – correlate closely with indicators of food access, including rates of food insecurity, the ratio of bodegas to full service grocery stores in a neighborhood, and the consumption of fresh fruits and vegetables.



New York City's food system also faces significant challenges in the next decade. These challenges underpin the strategies and initiatives the City will prioritize through a coordinated 10-year food policy plan. They include:

FOOD INSECURITY.

Nearly 1.2 million New Yorkers were food insecure as of early 2020, according to estimates by Feeding America. As a result of COVID-19, that number swelled to 1.6 million food insecure New Yorkers, including school children, seniors, parents, and working adults. Notwithstanding the importance of food pantries and soup kitchens, food insecure New Yorkers also eat at restaurants and schools and shop at bodegas, grocery stores, and farmers' markets. Central to food insecurity is the high cost of food in New York (the average cost per home cooked meal in 2018 was 30% higher than the national average); deeper economic insecurity including low wages; and poor access to healthy food options in low-income communities. NYC's food policy must first and foremost make sure all New Yorkers are food secure. Every New Yorker must have reliable access to enough affordable, nutritious food to sustain them.

BY THE NUMBERS

1.6 million New Yorkers are currently food insecure.

TWO in three food businesses in NYC have fewer than ten workers.

Nearly half of NYC's food travels to grocery stores, restaurants and schools from locations outside the city.

of carbon emissions nationwide result from agriculture.

RACIAL INEQUITY.

The current structure of the food system often deepens racial disparities. Communities of color in all five boroughs have less access to affordable, healthy food than white communities and they are disproportionately impacted by diet-related health diseases. While many food businesses are owned by people of color and workers in the sector are substantially people of color, low business margins and low wages often result in limited economic mobility. Furthermore, many distribution hubs and waste facilities are located in communities of color, therefore placing additional disproportionate environmental and health burdens on them. At the same time, many of the biggest innovations in food policy in New York City, from local farms to cooperative ownership models, have emerged from communities of color. NYC's food policy can support these successes and turn the food system into a source of health, wealth, and sustainability.

ECONOMIC INSECURITY.

Despite the importance of the food sector to NYC's economy, most food businesses and workers struggle to survive. Profit margins for food businesses are razor thin (as low as 1 to 2 cents per dollar of revenue), and food businesses face complex regulatory requirements that are costly and time consuming. Most food workers earn low wages with few or no benefits; the average grocery worker earns \$30,845 annually, the average restaurant or bar worker earns \$33,703 annually, and the average manufacturing worker earns \$41,550 annually, as compared to \$94,393 across all industries. Delivery workers typically earn even less and lack basic benefits and protections. NYC's food policy can help ensure that all food jobs are good jobs and that food businesses provide real economic opportunity.

CLIMATE RISK.

Rising sea levels and extreme weather caused by climate change will continue to both disrupt the global food system and threaten NYC's essential food infrastructure, including the Hunts Point Food Distribution Center and other waterfront distribution sites. The local and global food system also contributes to climate change, ecosystem degradation, and human health impacts. Food scraps make up as much as 20% of all household and commercial waste, and contribute a majority of methane emissions released from landfills. Moreover, pollution resulting from growing, transporting, and refrigerating food disproportionately impacts low-income communities of color. Nationally, the agricultural sector, including farms and livestock production, accounts for 10% of all carbon emissions, not including processing, transportation, cooking, and selling food for consumption.

Without forward planning, climate change will significantly disrupt the city's food supply. NYC's food policy can protect our infrastructure from climate risk while reducing our food system's negative impacts on our planet.

TECHNOLOGICAL CHANGE.

The rapid development of new technology in the food sector poses several near-term challenges. To name a few: on-demand delivery services have crowded streets and increased pollution; delivery apps have created new costs for businesses and raised concerns over both data rights and worker rights; and the march toward automation threatens employment especially in retail and manufacturing jobs. Yet technology also presents opportunities: to expand access to food assistance, to better coordinate transportation and reduce waste, to create more humane meat substitutes, and to create new jobs and growth sectors that provide economic opportunity. NYC's food policy can seek to accelerate and leverage positive technological change while mitigating the risks of rapid change.

THE COVID-19 PANDEMIC

As this plan is released, New York City continues to battle our worst public health and economic crises in recent history. While this plan takes a 10-year view, its priorities and strategies are informed by today's crises, both by the vulnerabilities exposed and by the historic efforts – citywide and grassroots – to get relief to the New York's residents, workers, and businesses.

The pandemic cast a glaring light on the fragility of our food system. As stay-athome orders and a decline in economic activity drove up unemployment, an estimated 400,000 additional New Yorkers experienced food insecurity. Meanwhile, nearly a third of food pantries closed as volunteer staff, particularly older adults, were advised to stay home. Restaurants and bars were devastated as revenues declined, with one-third to one-half of businesses at risk of permanent closure and more than 100,000 workers unemployed. This shock reverberated across the supply chain, as distributors and growers accustomed to

serving restaurants had to pivot to meet growing grocery demand. Most urgently, higher mortality rates among New Yorkers with preexisting medical conditions such as diabetes and heart disease pointed both to the importance of nutrition and the deep health disparities among Black and Latinx New Yorkers who are more likely to lack access to affordable, fresh food and have borne the brunt of Coronavirus cases and deaths.

One positive element to emerge from the pandemic was the way New Yorkers came together to assist one another. Houses of worship and community centers became food pantries and storage sites overnight. Caterers and restaurants donated hot meals and partnered with organizations like Rethink Food NYC and World Central Kitchen to distribute meals to emergency workers and their families. More than 50 volunteer-led mutual aid groups delivered groceries and supplies to neighbors. Dozens of community fridges emerged, offering free fresh food from sidewalks across the city. Organizations ranging from

health nonprofits to community foundations set up helplines and directories to connect New Yorkers in need with available aid. This rapid mobilization, and the power of community-led efforts to coordinate food networks, inspired numerous strategies in this plan.

The City needed to innovate, as well. In March 2020, the Mayor's Office mobilized to distribute free meals to all food insecure residents and to secure the food supply chain. The City funded emergency support to shore up the pantry network, set up grab & go free meal pickup sites at more than 500 schools, and recruited out-of-work for-hire vehicle drivers to deliver meals to homebound New Yorkers, altogether delivering more than 2 million meals per day. Agencies worked with businesses to interpret public health guidelines, secure protective equipment for staff, and safely serve customers: established outdoor dining and open streets programs in mere months; and monitored the virus' spread around regional food hubs, responding quickly to outbreaks to prevent supply

chain disruptions. The lessons from this unprecedented effort also inform our understanding of both the investments needed in the food system and what we know is possible with coordinated and collaborative action.



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NEW YORK CITY'S FOOD SYSTEM

Approximately 19 billion pounds of food flow through New York City every year. This flow is the product of a complex global supply chain that grows, processes, and distributes food, and a rich local food economy that prepares food for purchase and disposes of food waste. The workings of this supply chain affect the daily life of every New Yorker. Yet, unlike NYC's other essential systems – our road, water, and electrical networks, for example – our food system has no centralized design or management. Our food system is a "distributed" system, made up of tens of thousands of large and small businesses and nonprofit organizations - local, regional, national, and global - and millions of consumers, interacting largely independently to match food supply and demand.

NYC's food system is unique in two major ways. First, our city's ethnic diversity necessitates multiple complex supply chains that source products from across the region and the globe to cater to the distinct tastes and needs of New Yorkers. Second and relatedly, the majority of food businesses, from grocery stores to restaurants to distributors, are small-scale and independently owned, rather than national operations. This varied and nimble business landscape is well suited to serve NYC's unique needs and supports both economic opportunity and food system resilience, but it also poses risks, including coordination challenges and the general vulnerability associated with small-scale, independent businesses.

NYC'S 10-YEAR FOOD POLICY PLAN

NYC's food system can be broken into six discrete phases:



PRODUCTION consists of the growing, raising, and harvesting of fruits and vegetables, grains, animals, and any other raw materials for food. The vast majority of this activity happens outside of the five boroughs because of the large amount of arable land required. Exceptions include vertical indoor farms, rooftop farms, oysterculture and fishing, and community gardens that use a mix of conventional, hydroponic, and aeroponic growing techniques to produce food locally.



PROCESSING consists of any value addition that happens to those initial raw ingredients, whether the milling of grain into flour (primary processing), the baking of flour into bread (secondary processing or manufacturing), or the packaging of bread for sale (packaging). Most processing also occurs outside of the five boroughs. However, local food manufacturing has expanded in recent years, with NYC jobs in the subsector increasing by 27% from 2005 to 2015. Food businesses such as butchers and live animal markets, packing companies, and restaurants and caterers provide additional, though relatively small-scale, local processing capacity.



DISTRIBUTION refers to the storage, transport, and delivery of any food product from one place to another. The food that eventually reaches NYC consumers must be stored in warehouses (often with refrigeration, or "cold storage"), reorganized or repackaged for smaller-scale distribution to retailers and manufacturers, and delivered from the warehouse to the final "last mile" destination, usually a restaurant or grocery store. The majority of this process occurs outside the city. Even in the case of the last-mile distribution, only about half of deliveries originate from within the city. The city's food distribution system therefore relies on bridges and tunnels to reach their consumers, as 99% of the last-mile distribution is by truck.

Essential to the City's food distribution system is a series of major food hubs, the largest of which is the Hunts Point Food Distribution Center in the Bronx, which dispenses over 4.5 billion pounds of food each year and supports 8,500 direct jobs. Hubs also exist in Maspeth in Queens and Sunset Park and the Brooklyn Terminal Market in Brooklyn. These hubs receive food by truck, rail, and barge. John F. Kennedy International Airport also plays a role in food distribution, particularly for high-value and perishable products that arrive by air.

Feeding New Yorkers requires, in some cases, vastly different supply chains for different cuisines. Nationally, many large grocery stores rely on a handful of national distributors, which in turn rely on a small set of major manufacturers and processors that source food from their own industrial-scale farms and processing facilities. Supply chains that cater to Chinese and Southeast Asian consumers, however, have largely distinct supply chains that source from farms in New York, New Jersey, Florida, and Central America. They use smaller trucking and distribution networks that store goods in smaller warehouses in hubs like Chinatown, Sunset Park, and Maspeth, selling to both restaurants and consumers out of hybrid retail-warehouses. Caribbean food markets import products through the ports of Elizabeth, NJ, and Kennedy Airport, and both warehouse and process much of their produce in markets in eastern Brooklyn.



RETAIL is the final point of sale for food, where it reaches the customer. There are two types of outlets. The first is prepared food sellers, including restaurants, caterers, vendors, soup kitchens, and food pantries, and institutional cafeterias at schools, hospitals, and large employers. There are approximately 24,000 restaurants and bars in the city and thousands of additional prepared food sellers. The second type is packaged food and produce sellers, including full service grocery stores and bodegas, which sell food directly to consumers for off-site consumption. There are about 14,000 grocery stores and bodegas. As noted above, many of these businesses are small-scale: 64% of restaurants and 84% of grocery stores and bodegas have fewer than 10 employees. Retail food businesses are traditionally an area of employment and asset building for NYC immigrants.



CONSUMPTION is the point at which New Yorkers purchase, or otherwise obtain, and consume food. The vast diversity of palates and incomes of New York means that consumption varies drastically across the city. Food access also varies across the city. Owing to both a lack of historic investment in communities of color and clustering of low and high income New Yorkers, some neighborhoods have access to a range of grocery options and restaurants with fresh, nutritious food at accessible prices; in others, residents' access to affordable, healthy food, especially fresh fruits and vegetables, is limited or nonexistent. In these neighborhoods, fast food outlets, convenience stores, and liquor stores often outnumber healthy food outlets.



POST-CONSUMPTION, finally, refers to how the byproducts of food and food packaging are dealt with. Household food scraps and packaging is collected by the City whereas food waste from businesses and institutions is collected by private waste hauling companies. After it is collected, it is trucked or barged to privately run waste management

facilities, many of which are outside of the five boroughs.

For most of human civilization, food waste was typically used to add nutrients to soils or for animal feed, both of which helped produce more food. We no longer use this circular system, instead sending food waste to landfills. Today, nearly a third of household and commercial waste consists of biodegradable food scraps, which could be used for fertilizer or animal feed as our ancestors did, or as an energy source. When separating organics from other waste, we now have the technology to capture the methane created by decaying food and use it as a renewable energy source. Therefore, the City has launched several efforts to segregate and manage the processing of organic waste so as to close the loop on the currently linear food supply chain.

The region plays a large and growing role in this food system. Since the 1970s, a citywide network of farmers markets have strengthened connections between the region's farms and urban consumers. Today, hundreds of farmers' markets, farm stands, and community-supported agriculture (CSA) drop-off points dot the five boroughs, and NYC restaurants and grocery distributors provide a critical market for many of the region's farmers. The region is also where much of the processing and distribution activity that the City relies on occurs. Northern New Jersey is a critical food hub serving New York, home to regional distributors and national food service companies that distribute about one-quarter of the food that is distributed to point-of-sale outlets. The Lehigh Valley of Pennsylvania is another important cluster for last-mile distributors, as are upstate New York and Long Island.

In line with broader efforts by the City to strengthen regional partnerships, this plan both acknowledges the region's central role in food policy planning and seeks to deepen coordination with regional governments, businesses, and other partners.

FOOD POLICY IN NYC TODAY AND IN THE FUTURE

City government's role in the food system dates back more than a century, starting with the distribution of pasteurized milk to address infant mortality in the early 1900s to the first school lunch programs during the Great Depression to the rollout of food stamps in the 1960s.

Today, the City influences the food system in multiple ways:



1. The City administers and provides funding to critical food assistance programs that provide a lifeline to food insecure New Yorkers, dispensing over \$2 billion in SNAP, operating the largest school feeding program in the country, and funding the City's Emergency Food Assistance Program.



2. The City regulates food businesses, directly through permits and licenses and indirectly by setting policy for land use, transportation, and labor practices. In this way, the City has multiple tools to support restaurants, producers, distributors, street vendors, and other businesses. The City also offers services such as loans, grants, training, and technical assistance to food businesses that meet certain criteria.



3. The City manages critical food infrastructure, including the Hunts Point Food Distribution Center in the Bronx as well as vital industrial sites in all five boroughs that house supply chain businesses and the road network on which most food businesses rely.



4. The City is a **major food purchaser**. We spend about \$500 million annually on food across all departments, from schools to public hospitals to senior centers, making up about 2.5% of total food sales.



5. The City has a unique power to convene, plan, and advocate. Because our food system is so complex and distributed, no single entity has a complete picture of what's needed or a platform to plan ahead. The City can play an important role in convening experts, sharing data and knowledge, leading efforts to change state and federal policy, and setting an ambitious agenda around which communities, businesses, institutions, philanthropies, and regional partners can work together.



6. The **Mayor's Office of Food Policy** is now enshrined in the City Charter with a mandate to lead City food policy and coordinate multi-agency initiatives. This provides the City with the structures to leverage all the tools mentioned above and pursue ambitious, multi-sectoral policy.

WHO DOES WHAT IN CITY GOVERNMENT ON FOOD POLICY?

Virtually every agency in City government interacts with the food system in one way or another. This chart is a high level representation of the major functions of the City that make and implement food policy. It is not, however, an exhaustive list.

ENTITIES THAT SET POLICY, PROVIDE OVERSIGHT AND MANAGE SYSTEMS

Mayor's Office of Food Policy: Sets citywide policy and coordinates major interagency initiatives.

Law Department: Provides legal counsel to City officials on issues related to food policy.

Mayor's Office of Contract Services: Leads procurement systems and oversight.

Department of Citywide Administrative Services: Conducts procurement for several agencies.

Emergency Management: Coordinates citywide emergency planning and response for all types and scales of emergencies.

AGENCIES THAT SERVE FOOD AS PART OF THEIR PROGRAMMING

Department of Corrections

Department of Education

Department of Homeless Services

NYC Health + Hospitals

Human Resources Administration

AGENCIES THAT SUPPORT THE CITY'S FOOD SUPPLY

Department of City Planning

Department of Health & Mental Hygiene

Department of Environmental Protection

Department of Parks & Recreation

Department of Sanitation

Department of Transportation

Economic Development Corporation

Mayor's Office of Sustainability

New York City Housing Authority

Small Business Services

In recent years, the City has launched efforts to expand food access, strengthen the food sector, and address inequity in NYC's food system.

Example efforts include:



School Food:

Since September 2017, every public school student has access to free lunch, and starting in 2015, schools began rolling out Breakfast in the Classroom – now available in nearly 600 school buildings. Schools also launched "Meatless Mondays" and "New York Thursdays," celebrating local produce.



Workers' Rights:

Through City advocacy and legislation, New York City's minimum wage increased to \$15 per hour and food workers enjoy expanded protections, including paid sick leave and control over shifts. An emboldened Department of Consumer and Worker Protection also expanded its enforcement and advocacy efforts to protect workers.



Get the Good Stuff:

New Yorkers enrolled in the Supplemental Nutrition Assistance Program (SNAP/EBT) now earn an extra dollar in rewards points for every dollar they spend on fruits, vegetables, and beans at participating NYC grocery stores. The benefit (up to \$50 per day) can be used for the next purchase of eligible produce.



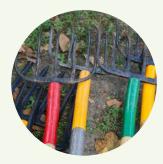
Shop Healthy NYC:

As of March 2020, more than 1,800 food retailers, including bodegas and grocery stores in neighborhoods with high food insecurity, have pledged to increase their stock and promotion of healthy foods.



Hunts Point Resiliency:

The City is making investments to mitigate flood risk, provide backup power, and reduce emissions at this regional food hub, in a project that will also protect and build social resilience for the broader Hunts Point neighborhood.



Food at NYCHA:

Launched in 2015, the Food Business Pathways program has provided training and assistance for resident entrepreneurs to launch 189 food businesses to date. Farms at NYCHA, part of a broader effort to improve health outcomes in 12 neighborhoods, now has six farms in operation.

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GOOD FOOD PURCHASING

The Good Food Purchasing Program (GFPP) is a framework that helps institutions better understand the source of the food they purchase and provides a methodology to quantify the impact of the food along five core values.

The program offers unprecedented transparency and accountability to an issue rarely discussed by governments, institutions, businesses, or individuals: the true cost of the goods we consume. When low cost is prioritized over social and environmental values, there are inequitable impacts on the health and wellbeing of people, animals, and the environment. Through this framework, large-scale food purchasers like City agencies are able to adapt and leverage their spending and contracting for positive impact.

Launched in Los Angeles in 2012, the program has expanded to 53 institutions or agencies across 20 cities, with 14 formal policy adoptions, and more than \$1 billion in annual food spend leveraged. In 2017, subject to legal restrictions on the City's ability to engage in "social policy" purchasing, the Office of School Food & Nutrition Service enrolled in the program. In 2019, the program was expanded effectively citywide across six additional agencies, making NYC one of the few municipalities to adopt GFPP values across all food programs. In doing so, City agencies will act as leaders in the regional food system and offer proof points for broader application of good food purchasing.

The core values guiding the program are:

- Local Economies Support small, diverse, family and cooperatively owned, and midsized agricultural and food processing operations within the local area or region.
- Nutrition Promote health and wellbeing by offering generous portions of vegetables,

fruit, whole grains and minimally processed foods, while reducing salt, added sugars, saturated fats, and red meat consumption, and eliminating artificial additives. Improving equity, affordability, accessibility, and consumption of high quality culturally relevant Good Food in all communities is central to our focus on advancing Good Food purchasing practices.

- Valued Workforce Provide safe and healthy working conditions and fair compensation for all food chain workers and producers from production to consumption.
- Environmental Sustainability Source from producers that employ sustainable production systems that reduce or eliminate synthetic pesticides and fertilizers; avoid the use of hormones, routine antibiotics, and genetic engineering; conserve and regenerate soil and water; protect and enhance wildlife habitats and biodiversity; and reduce on-farm energy and water consumption, food waste and greenhouse gas emissions; and increase menu options that have lower carbon and water footprints.
- Animal Welfare Provide humane care for farm animals by improving overall wellbeing through better rearing practices and/or reducing total numbers raised.

While all the plan's strategies relate, in one way or the other, to the five values above, certain strategies are directly in service of the implementation of the program and you can identify them with . For more information, visit nyc.gov/GFP.



NYC'S 10-YEAR FOOD POLICY PLAN

THE VOICES THAT SHAPED THIS PLAN

Food Forward NYC builds on decades of work, thought, and learning by communities, food policy advocates, and City staff, and was shaped by what the City heard directly from New Yorkers about how they want their food system to work for them.



We are indebted to the more than 300 individuals who contributed

their time and policy recommendations in workshops, briefings, and individual conversations carried out over the fall and winter of 2020 – including representatives of food businesses, workers, community-based organizations, advocates, and philanthropy. These discussions were essential to the development of plan priorities, as were the contributions of the members of the NYC Regional Food Working Group.

This policy plan also draws on insights from two recent community-based engagement efforts: "Take Care New York," which included dozens of community workshops on health equity, and the COVID-19 Taskforce on Racial Inclusion and Equity, which surveyed hundreds of community organizations. Supplementing this outreach was an extensive review of policy recommendations and plans developed in NYC over the past two decades and best practices from around the world. City staff from dozens of agencies also contributed to the development of the strategies included in the policy plan.

Finally, the policy plan builds on the goals and strategies articulated in NYC's strategic long-term plan, OneNYC, which seeks to promote equity, sustainability, resiliency, and growth and is premised on the notion that these four themes cannot be achieved alone but are mutually dependent. This is the spirit that animates Food Forward NYC.

New York City's food system faces serious challenges over the next decade. The 10-year food policy plan lays out 5 goals and 14 strategies to confront these challenges while seizing related opportunities.

Goals for NYC's food future

GOAL	DESCRIPTION	PAGE
1	All New Yorkers have multiple ways to access healthy, affordable, and culturally appropriate food. The city faces an unprecedented food insecurity crisis, affecting nearly one in five New Yorkers, that requires a focus beyond traditional emergency food systems. NYC will: A. Expand food benefits to reach more New Yorkers in more places. B. Distribute food more equitably. C. Reconfigure how the City sources food.	27
2	New York City's food economy drives economic opportunity and provides good jobs. NYC's extraordinarily diverse food system depends on tens of thousands of small and micro businesses and the hundreds of thousands of workers who make them run. NYC will: A. Protect food workers, improve pay and benefits, and support ownership. B. Support small food businesses by cutting red tape, protecting data, and promoting innovation. C. Train the next generation of food workers for high-quality jobs.	41
3	The supply chains that feed New York City are modern, efficient, and resilient. The plan is committed to securing and improving our critical infrastructure and recognizes that strengthening regional connections is critical to that end. NYC will: A. Strengthen the City's food infrastructure. B. Improve regional coordination and sourcing. C. Support increased urban farming.	51
4	New York City's food is produced, distributed, and disposed of sustainably. Our food system has profound impacts on the local, regional, and global environment, as well as animal welfare. NYC will: A. Integrate sustainability and animal welfare into City food programs. B. Reduce in-city air pollution and greenhouse gas emissions from the food system. C. Promote innovation around food and sustainability.	61
5	Support the systems and knowledge to implement the 10-year food policy plan. Few systems are in place, whether in City government or outside of it, that have the capacity and the knowledge to alone implement a comprehensive food policy. NYC will: A. Strengthen community engagement and cross-sector coordination around the development and implementation of food policy. B. Create and share knowledge about the food system.	69



GOAL

All New Yorkers have multiple ways to access healthy, affordable, and culturally appropriate food.

BACKGROUND

New York City's flavor palate is as diverse as its population, weaving traditions from Black, Indigenous, and immigrant food cultures. From kosher markets in Borough Park to Indian groceries in Jackson Heights, from street food vendors to large cafeterias, accessing food looks different for every New Yorker. New York City's food system needs to provide multiple ways for its residents to access healthy, affordable, and culturally appropriate food, including in ways that encourage building community and connection.

However, many New Yorkers still struggle to get the food they need. As of fall 2020, there were 1.6 million food insecure New Yorkers, according to estimates by Feeding America.¹ This challenge is exacerbated by the fact that food costs in New York City are very high. The average cost per meal (the cost of grocery ingredients, not prepared foods) in 2018 was \$4.08, over 30% higher than the national average.² Furthermore, the burden of food insecurity is not distributed equally. Food insecure New Yorkers disproportionately belong to communities of color - reflecting historic discrimination and structural disadvantages and further deepening existing racial inequalities.

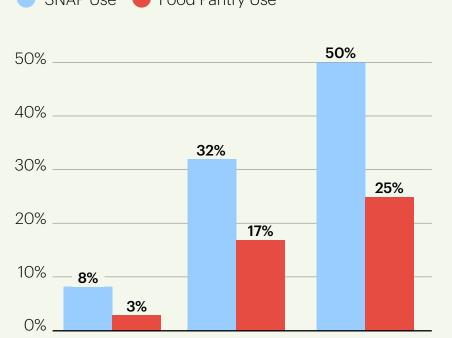
Food insecure New Yorkers are all of us - schoolchildren, seniors, parents, working adults - and have varying food needs. Some New Yorkers observe restrictions on the food they eat guided by faith, values, or health. This includes but is not limited to kosher, halal, vegetarian, vegan, or gluten-free meal patterns.

While much attention is often paid to the emergency food system - food pantries and soup kitchens - many food insecure residents get their food in many different ways, including at schools, grocery stores, farmers' markets and restaurants. One study looking at New Yorkers facing food hardship found that only 25% of New Yorkers who face severe food hardship and only 17% of New Yorkers who face moderate food hardship typically use the emergency food system.³

For all New Yorkers to get the food they need and want, they need multiple ways to access healthy, affordable, and culturally appropriate food that meets them where they are. The plan embraces that food intersects with New Yorkers' health and the broader economy in multiple ways, and not simply with regard to hunger; that food is important as an expression of cultural identity and as a way to connect with family and friends; and that food can bring tremendous joy.

The strategies are also anchored in the recognition that the food system's failure to provide healthy, affordable, and culturally appropriate food disproportionately impacts communities of color. To help redress that, the plan places a particular focus on solutions that make it easy for the people living in communities that have faced the burden of these disparities to access the food they want where they want it.





Moderate food

hardship

No Food

Hardship

Severe food hardship:

Often running out of food or worrying that food would run out before there was enough money to buy more.

Moderate food hardship:

Sometimes running out of food or worrying that food would run out before there was enough money to buy more.

No food hardship:

Not running out of food or not worrying that food would run out before there was enough money to buy more.

SOURCE: ROBIN HOOD POVERTYTRACKER DATA. RESULTS PRODUCED BY THE CENTER ON POVERTY AND SOCIAL POLICY AND COLUMBIA UNIVERSITY. 2018.

Severe food

hardship

STRATEGIES



LONG TERM





Expand food benefits to reach more New Yorkers in more places.

Launch a new food program to address food security issues exacerbated by the pandemic •

The COVID-19 pandemic has both shed a light on and exacerbated food insecurity challenges in New York City. As a continuation of the City's work on its Emergency Food Delivery program, the City will launch a new healthy food benefit that helps fill the gap in SNAP access and grocery delivery. The program will enable the use of SNAP online and will allow for the participation of small, independent grocery stores.

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Expand "Get the Good Stuff"

In 2019, the City launched Get the Good Stuff, a program that offers a dollar-for-dollar match on fruit and vegetables purchased with SNAP at participating grocery stores. The program helps make fruits and vegetables more affordable for New Yorkers with low incomes by increasing their purchasing power and ability to choose healthy foods. It



also provides an opportunity for neighborhood grocery stores to expand their customer base and sell more produce. The City will expand this program to more low-income neighborhoods and pursue philanthropic support to reach every low-income neighborhood by 2030.

Include whole families in summer meal programs permanently • •

As part of its emergency response to COVID-19, the City has allowed whole families—adults in addition to children—to access its free, no-questions-asked, grab & go meal service in schools. The City is committed to continuing this approach and will advocate to the federal government to make summer meals for families a permanent program, as well as remove the congregate meal requirement. The City will also explore ways that summer meal programs can support local food businesses, building off of the success of the Pandemic EBT program.

Pursue federal and state action to expand and improve SNAP and other food benefits • •

SNAP is an essential program for feeding New Yorkers and expanding and improving it is foundational to any efforts around food insecurity. The City will pursue federal and state action to increase maximum and minimum SNAP benefits and expand the list of eligible foods to include prepared foods. The City will also push for improving access to SNAP online, including simplifying the process for smaller retailers to gain access to SNAP online, allowing SNAP dollars to be used for delivery fees, and protecting users from predatory marketing. The City will advocate for expanded federal funding for initiatives that leverage SNAP to incentivize healthy foods, and will push for integration of demonstrated approaches that improve nutrition and preserve choice without limiting access or reducing benefits from federal assistance programs. The City will also pursue changes to the WIC program, including extending WIC benefits up to age 6, increasing WIC benefits to \$35 dollars per month, and developing new strategies to address food insecurity in youth and college students by providing reimbursable meals and extending access to food benefits programs.

Make it possible to leverage healthcare coverage for medically tailored meals ● ❖

The City will pursue state and federal action to make it possible to leverage healthcare coverage for medically tailored meals. This will include providing Medicare/Medicaid coverage for medically tailored meals.

EVERYONE SHOULD BE ABLE TO ACCESS THE FOOD THEY WANT WHEREVER THEY MAY WANT IT.

Pursue federal and state change to expand the reach of produce prescription programs • •

The City will pursue state and federal action to fund and expand the reach of produce prescription programs and make them a standard service offer for the populations Medicare and Medicaid serve. This may include funding and requiring the promotion of of Produce Prescription Programs through Medicare Advantage (Medicare Part C) Value-Based Insurance Design Model (VBID), encouraging Medicaid Managed Care Organizations to cover Produce Prescription Programs through their "in lieu of" services, value-added services, and supporting innovations such as the GusNIP Produce Prescription pilot. Additionally, the City will advocate to ensure that these programs are designed so that they can be fulfilled by small businesses and food non-profits located in the communities served.

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Partner with health systems to increase access to healthy foods

Health insurers, hospitals, and other healthcare providers are increasingly exploring investments in healthy foods to improve the health outcomes of their clients. The City will accelerate this process by advancing partnerships with health systems such as piloting a grocery store within a City hospital or creating new healthy food benefits.



Distribute food more equitably.

Transform the emergency food network •

The City is eager to improve equity and resilience in NYC's emergency food system, particularly considering the historic spike in food insecurity wrought by the pandemic. To achieve this, the City will build more overall capacity to distribute food, especially in neighborhoods in highest need of emergency food. These capacity enhancements will focus on key vulnerabilities of the pantry system - from physical infrastructure needs, to technology, to innovative methods of food distribution. The City will enhance EFAP (Emergency Food Assistance Program) and ensure it is more equitably distributed. Through these efforts, the emergency food system will be transformed so that it ensures an equitable distribution of nutritious resources, aligned with food-insecure New Yorkers' nutritional needs, and delivers a resilient network of programs that operate efficiently, safely, and with dignity even during a crisis.

Enable food businesses to utilize more outdoor space

To enable restaurants to continue utilizing outdoor space, the City will work to make the outdoor dining program permanent, including working with the City Council on the regulatory changes necessary. Additionally, the City will explore the creation of temporary markets that include the sale of food with a particular emphasis on increasing economic activity and expanding access to fresh food in areas with limited food access.

Evaluate options to limit exposure to unhealthy food and food marketing

A healthy food environment is, among other things, one where there is limited exposure to unhealthy food marketing as well as unhealthy foods. The City will review its own policies to identify potential actions to limit New Yorkers' exposure to advertising, marketing, and promotion of unhealthy foods, and will explore ways to limit availability of unhealthy foods by, for example, eliminating sales of sugary drinks in City vending machines. At the same time, the City will push for state and federal policies that support reduced intake of over consumed dietary components like added sugars and sodium.

Explore new ways to expand farmers' markets and other programs that bring fresh fruits and vegetables to underserved communities •

The City will explore new assistance programs that will allow sustainable expansion of farmers' markets, farm stands, community-supported agriculture (CSA) programs, and similar models in underserved communities. For example, mini-grants can support capital and operating expenses and provide technical assistance to producers and providers. The City will do this through partnerships with philanthropic entities and community-based organizations and by advocating for state and federal policy changes that get more fresh foods from local farms to low-income communities. Additionally, the City will strengthen the NYC Green Cart program. The program was introduced in 2008 as a way to increase access to fresh fruits and vegetables. To increase business viability, the City will expand the types of healthy foods Green Cart vendors are permitted to sell, allow vehicles to be used in addition to carts, and will explore other ways to support vendors (for example, new technology to accept EBT).

Support breastfeeding parents in hospitals, workplaces and community settings

In order to protect, promote and support breastfeeding in the long term, the City will partner with hospitals, birthing centers, employers, and community partners to increase the number of Baby-Friendly maternity facilities in NYC. We will also encourage the development of community and workplace supports for breastfeeding by conducting professional lactation trainings, providing lactation education and support to new parents, offering technical assistance to employers, schools, child care centers, and other community partners to expand lactation programs and spaces, and promoting family-friendly policies such as paid family leave. These changes are expected to have the most lasting impact in communities of color and groups with traditionally low breastfeeding rates

Pursue federal support for businesses and nonprofits that provide fresh fruits and vegetables in underserved communities

To expand the range of businesses and nonprofits that provide fresh produce in underserved communities, the City will pursue the creation of new federal programs that will offer capital and operating subsidies to qualifying businesses and nonprofits that offer such services. The City will ensure that such subsidies apply to various cooperative models as well as more traditional business models.

Study ways to improve access to cold storage in underserved communities

The City will conduct outreach, stakeholder engagement, and research to better understand the cold storage infrastructure needs and constraints facing both small-scale food businesses such as bodegas and non-profit food pantries, with a focus on the unique challenges faced by those operating in underserved communities. This study may include investigating refrigeration, electrification, freight access, access to capital, and other challenges. Potential policy solutions may include a "cash-for-clunkers" refrigeration trade-in program, low-cost loans for improving or expanding cold storage space, shared off-site cold storage facilities, and others that may arise through the engagement process. The City will then work with industry, philanthropic, and State and federal partners to provide resources to businesses seeking to improve or expand their cold storage capacity.

Improve cafeteria culture in public schools

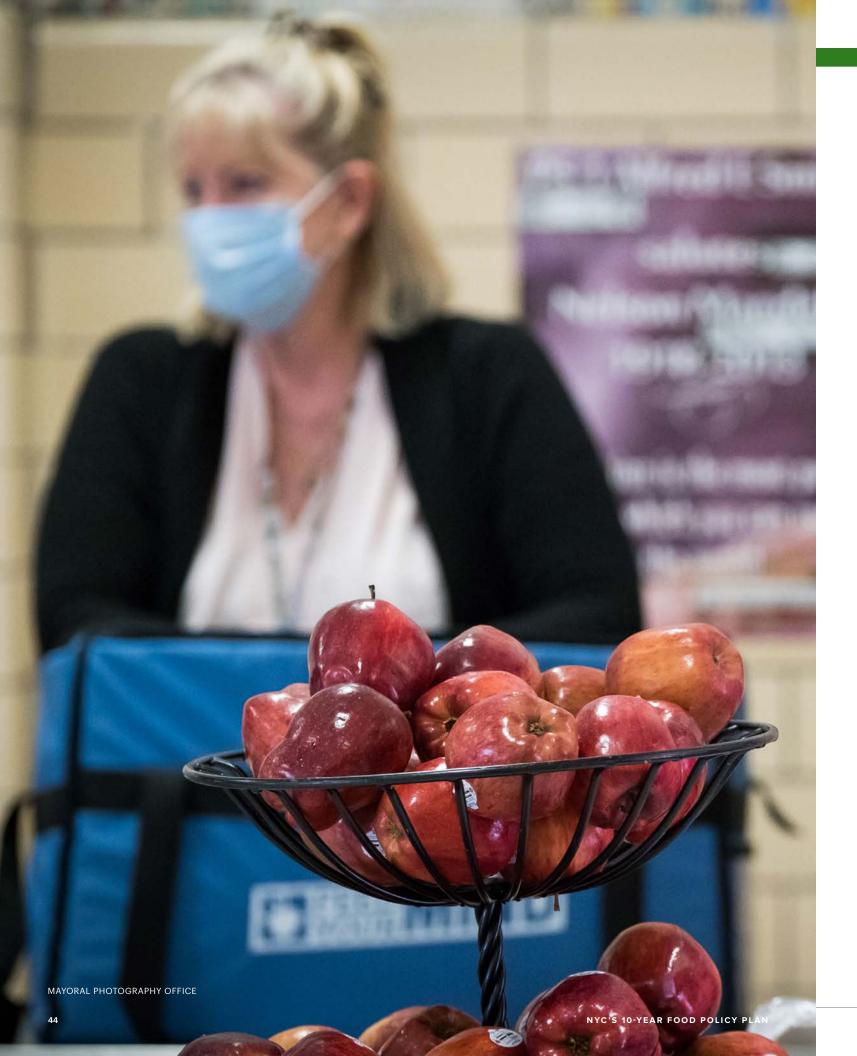
As part of its strategic planning process, the Office of Food & Nutrition Services (OFNS) at the Department of Education (DOE) will develop an action plan that encourages principals and school kitchens to create a physically attractive, caring, and calming cafeteria environment allowing meals to be more enjoyable. Potential strategies include: scheduling adequate time to eat during appropriate hours, preparing fruits and vegetables that are easier to consume, and creating more efficient and sustainable cafeteria practices such as offering grab-and-go style service and composting uneaten food.

Explore ways to increase the amount of freshly prepared meals in public schools • • • •

Access to healthy, whole foods is a priority for NYC public schools, as such meals provided to our students should be cooked from a primarily scratch menu. All City schools should aim to serve fresh meals made from ingredients in their most basic form, prepared at or near the site of consumption, as often as possible. The City will explore ways to ensure that that a citywide menu includes more fresh fruits, vegetables, and healthy grains, less meat, more locally accessed food, and increased access to safe drinking water. The City will conduct a landscape analysis to identify facilitators and barriers related to infrastructure, labor, ingredient availability, communication, and community input related to scratch-cooking. The City is committed to increasing access to fresh, whole foods for its students and will advocate for state and federal policy changes and increased support that will allow more fresh fruits and vegetables and scratch-cooked meals in schools.

Explore new partnerships with schools around food access

School kitchens can act as critical food infrastructure in low-income communities. The City will explore pathways for using school kitchens for other food uses during times in which they are underused. For example, community-based organizations could serve holiday meals using the kitchen space. Additionally, the City will explore expanding the food and nutrition offerings available through community schools, whether it is expanding the food pantry program to schools that currently do not have a food pantry or providing other programming to address food insecurity.



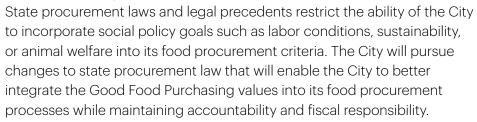
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Reconfigure how the City sources food.

Create a shared commercial kitchen for providers serving older New Yorkers ● ✓

The NYC Department for the Aging (NYC Aging) is partnering with Citymeals on Wheels to create a first-of-its-kind commercial kitchen available for use by various DFTA-contracted providers. Food service providers, particularly under-resourced providers, can use this commercial-grade kitchen to safely prepare, cook, and store food and equipment without having to own and maintain the facility themselves. While priority will be given to providers that cater meals, the kitchen will also provide opportunities to prepare and store meals for emergencies.

Push for changes in state procurement law ●◎ ✓



Explore new ways to centralize and improve City food procurement ••

The City will study additional ways to centralize and streamline food operations, including additional kitchens, central warehousing, and centralizing more of the City's procurement. Additionally, City agencies will continue to prioritize the procurement of more wholesome foods that are minimally processed.

Study the viability of food hubs that expand public schools' access to cold storage, processing space, and preparation capacity

Schools often lack the space to store, process, and prepare many of the fresh ingredients needed to scratch cook; however, retrofitting every school cafeteria would be very difficult given space and budget constraints. The City will study the viability of food hubs as a tool to help schools overcome barriers to scratch cooking by providing cold storage, processing space, and preparation capacity. The City will also explore ways to secure federal funding for such investments.

NYC'S 10-YEAR FOOD POLICY PLAN



GOAL 2

New York City's food economy drives economic opportunity and provides good jobs.

BACKGROUND

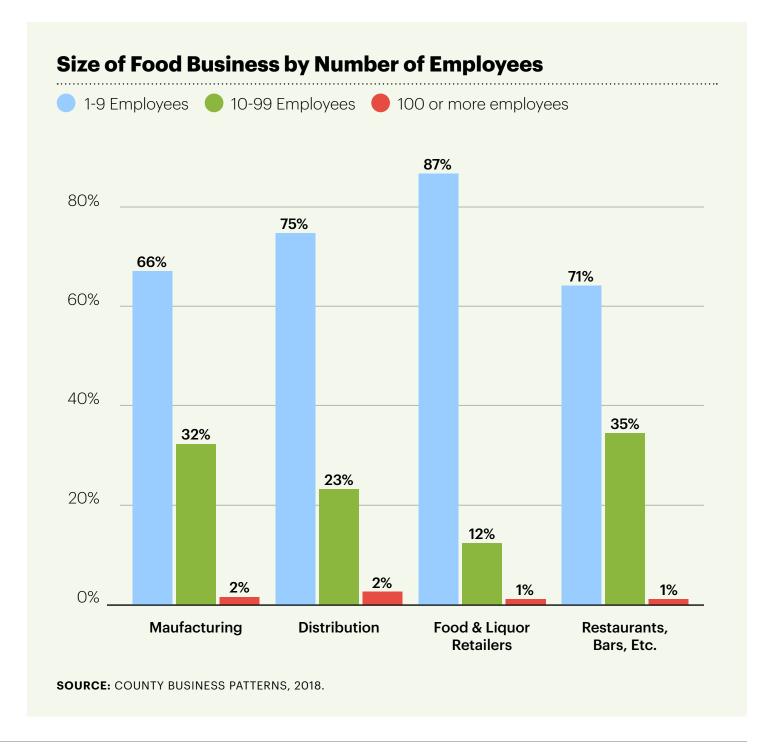
The city has over 40,000 food businesses that employ hundreds of thousands of workers. The precise number of workers is difficult to calculate because there is not reliable data on the many "gig economy" workers employed in food delivery. These workers and businesses are essential to the health and wellbeing of New Yorkers. The food industry is an important source of employment and asset building for communities of color and immigrant communities (79% of food workers who live in NYC are people of color, including 43% Latino and 21% Asian).⁴

The restaurant industry is also vital to the city as a major draw for residents, workers, and visitors, underpinning many other industries such as office employment in the central business districts and serving as a draw for tourists. Indeed, the restaurant industry is key to making New York City the compelling place that it is. Its economic contribution is also large. In 2019, the industry made nearly \$27 billion in taxable sales.⁵

However, working or owning a business in the food sector can be extremely challenging. Businesses in the food sector typically operate on low profit margins, a particular challenge considering the high costs associated with operating a business in the city. About 99% of the city's food businesses are small businesses, with fewer than 100 workers, and 70% are micro-businesses with fewer than 10 workers.⁶

Furthermore, food workers are typically paid low wages, lacking job security and mobility opportunities. In New York City, the average worker in the grocery industry earns \$30,845 annually, the average worker in the restaurant and bar industry earns \$33,703 annually, and the average worker in the manufacturing industry earns \$41,550 annually. This is far lower than the average wage across all industries in NYC, \$94,393.7 Many delivery workers - a growing element of the food sector - are considered independent contractors and do not have access to the same protections and benefits that employees have.

The strategies below recognize that, if the City wishes to improve the food system, this starts with supporting both food workers and food businesses, and that supporting both is not mutually exclusive but in fact reinforcing. The strategies also look to the future of food businesses, including supporting new ownership models aligned with the principles of economic democracy and anticipation of technological change.



STRATEGIES







Protect food workers, improve pay and Protect rood workers, improve parbenefits, and support ownership.

Enforce fair scheduling laws in fast food •

The City will rigorously enforce its fast food fair scheduling laws, so that fast food jobs in New York City are good jobs with stable, predictable schedules and pay. Strong enforcement will ensure that fast food workers are scheduled fairly and provided with additional income when their schedules are changed at the last minute. Enforcement will also ensure that fast food workers can combine regular shifts to create a pathway to full-time employment in a notoriously high-turnover industry.

Create financing and technical assistance plans to support worker-owned cooperatives

Cooperative models have a long history in the food sector. Worker-owned cooperatives in particular can be a powerful tool to build assets and address the wealth gap in NYC. The City will align existing assistance programs aimed at supporting cooperatives such as Employee Ownership NYC to the needs of food businesses and explore the creation of new financing and technical assistance programs specifically tailored to the needs of food businesses. Where the City may not be best suited to interface directly with businesses, the City will explore ways to work with community-based organizations, business improvement districts (BIDs), and merchant associations to support cooperative incorporation efforts in all five boroughs.

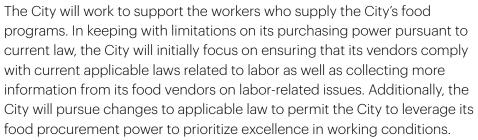
Push for state and federal changes that improve the condition of workers in the food industry • •

The City will push for a range of state and federal actions to improve the condition of workers in the food industry. This will include:

- (i) Ensuring that all federal and state benefits programs for workers are accessible to food workers across the industry.
- (ii) Removing laws that restrict employers' liability for failing to protect the health of their workers.
- (iii) Changing state regulations on tip pool sharing to expand the list of employees who can participate in the tip pool, allowing non-tipped back of house workers to receive a portion of tips.

(iv) Establishing hazard pay for essential food workers during emergencies.

Support the workers who supply the City's food programs ••



Explore ways to expand the City's existing childcare programs to include night care for children of food service workers •

During the COVID-19 crisis, the City recognized food service workers as essential employees and provided access to childcare through the Regional Enrichment Centers and childcare programs around the city. As the City moves toward recovery, it will explore ways to expand existing childcare programs or create new programs that include evening and weekend hours, when childcare is most needed and least available. Access to evening and weekend childcare would afford parents greater flexibility to work and reduce costs in what is often an evening and weekend industry.

Conduct a feasibility study on ensuring basic social safety net benefits • •

The City will conduct a feasibility study on ensuring basic social safety net benefits to cover food workers, wherever they work. The study will explore potential partnerships with food workers, businesses, community-based organizations, and financial institutions. The program will ensure food workers have benefits such as retirement savings and health and other insurance. The City will also push for federal action to ensure adequate and equitable social safety net benefits for all workers, regardless of employer, place, or nature of work.



2B. Support small food businesses by cutting red tape and supporting innovation.

The City will push for state legislation to enable the creation of a NYC Small Business Recovery Tax Credit for small businesses including food businesses. Eligible businesses with gross revenue below \$1 million will be eligible for a tax credit equal to 6% of their calendar year 2021 rent, up to maximum credit of \$10.000.

Streamline regulations and enforcement processes related to food businesses

The City will review regulations and enforcement processes governing small food businesses, including street vendors, to identify opportunities for streamlining. The City will identify potential efficiencies and expand consolidated permitting and inspection services, allowing for streamlined approvals for new and existing small food businesses. The City will also expand outreach and engagement opportunities around all matters related to food businesses, partnering particularly with immigrant organizations.

Support NYCHA food entrepreneurs

The City will collaborate with businesses and community-based organizations to expand NYCHA Food Business Pathways. The business accelerator program was created to empower residents of NYCHA public housing developments and New Yorkers holding NYCHA Section 8 vouchers to start and grow food businesses.

Advance initiatives that protect food business and customer data

Having a successful food business operation increasingly depends on access to data-driven business services provided by third-party providers. However, food businesses frequently lack the specialized knowledge or capacity to undertake these services under terms that are beneficial to them and may be unable to access critical information such as their own customer data. The City will leverage its convening power to bring together multiple stakeholders to advance initiatives that protect food businesses and customer data such as a "data bill of rights" for food businesses and customers.

NYC'S 10-YEAR FOOD POLICY PLAN 5

Push for expanded and new state and federal programs that support the needs of food businesses and cooperative efforts



The City will convene stakeholders in the food sector to identify and design new programs that meet the unique needs of food businesses and nonprofits. The City will then push the state and federal government to implement them. This may include developing new financing and technical assistance programs to small food businesses that wish to form cooperative arrangements with each other and to support worker-owner cooperative efforts.

Make it easier for vendors to participate in City procurement

The City will make it easier for potential food vendors to negotiate the City procurement process. PASSPort, the City's digital procurement portal, will roll out new features that will improve the City's procurement process. This includes simplifying the solicitation process, assisting in speeding up invoicing, and more generally increasing transparency and interagency collaboration. In addition, the City will explore strategies that increase the number of bids on City food contracts by leveraging matchmaking tools and group purchasing strategies; expand technical assistance in navigating the procurement process; provide process navigators who can assist small vendors through the procurement bid process; and explore opportunities to streamline the M/WBE application process.

Train the next generation of food workers Train the next general for high-quality jobs.

Launch a Food Community Hiring initiative



In alignment with the City's current HireNYC program and expanded hiring requirements through proposed Community Hiring state legislation, the City will identify good entry-level jobs across its food purchasing including food production, distribution, transportation, and related jobs. The City will connect existing and new training programs as referral sources for the City's vendors and establish goals requiring vendors to provide interviews and offers of employment to qualified low-income individuals from these referral sources. The City will also partner with anchor institutions to expand the number of good entry-level jobs available across food purchasing, with a special focus on anchor institutions in underserved communities.

Support training for food technology careers

The City's food and beverage and manufacturing and industrial industry partnerships will continue to remain attuned to technology changes in the industry. These partnerships will advise the Department of Small Business Services (SBS) on the development of customized workforce training programs in new technologies for incumbent workers. This will ensure that the workforce stays ahead of technological shifts and that incumbent workers learn new skills on the job, rather than being fully replaced by new technologies.

Support the creation and expansion of career pathways in the food sector

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The City will ensure that jobs in the food sector – from warehouse workers to back-of-house restaurant staff - are in fact pathways to professional and wage growth. This will include expanding apprenticeships and developing additional training, certification, and entrepreneurship programs for food workers. These efforts will take the form of:

- (i) Expanding commercial kitchen training and entrepreneurship programs such as First Course NYC and Food Business Pathways.
- (ii) Providing English as a Second Language (ESL) services targeted at
- (iii) Exploring DOE Career and Technical Education programming for food production, manufacturing, storage, distribution, in partnership with industry.
- (iv) Connecting youth training programs with career pathways in industry.
- (v) Exploring options to develop the NYC Health Department's Health Academy, a workforce development hub where offerings can include food safety trainings for food workers.

Create workforce development programs for school food workers

Serving the healthiest and freshest food possible to our city's students requires a well-trained workforce. The City will partner with academic and private sector partners to develop an intensive and comprehensive training curriculum for all school food managers. Training topics may include, but not be limited to, leadership skills, storage and organization, knife skills, tool and equipment use, basic cooking techniques, menu planning, and food preparation. The City will also analyze training programs already in existence to see if they could be scaled up.



GOAL 3

The supply chains that feed New York City are modern, efficient, and resilient.

BACKGROUND

The food that nourishes New Yorkers originates from all over the world. New Yorkers checking the labels on their food may see the names of states from coast to coast and countries on multiple continents. While certain elements of the supply chain work well, the current lack of overall planning and coordination within the food system results in some components negatively impacting the city. A clear example of that is "last-mile" transportation - the last leg of the supply chain where goods are brought to a final destination - which occurs nearly exclusively by truck transportation that adds to congestion and air pollution.

The long distance the city's food travels can make it harder for policymakers and New Yorkers generally to understand where their food comes from, understand the food system's vulnerabilities, and promote a fairer, more sustainable food system. For example, meatpacking plants have been host to some of the largest hotspots for COVID-19 infection in the nation. As workers fell ill, the supply of meat was disrupted. The City had few tools to anticipate the problem, to help identify alternative foods, or pursue better conditions for the vulnerable meatpacking workers who bore the brunt of the crisis in their industry.

Furthermore, the COVID-19 pandemic is a harbinger of future crises that the food system is likely to face. Under any scenario, climate change is expected to have a major impact on the global food supply,⁸ and the City must prepare for it. Other disasters may strike - an extreme weather event, for example - and will test the city's food system yet again.

Creating a more modern, efficient, and resilient food system will require moving more of the food supply chain within New York City, as well as the greater region, in such a way that increases food access in underserved areas and creates more opportunities for food producers to aggregate and operate more efficiently. This includes increasing the

city's food distribution capacity as well as producing and processing more foods in other parts of New York State and neighboring states, such as New Jersey, Connecticut, Pennsylvania, Vermont, and Massachusetts. It also includes strengthening urban farming within the city, not simply for the food it can produce but also because of the educational value and the transparency that in-city food production creates in the food system.



STRATEGIES





Strengthen the city's food transportation and distribution infrastructure.

Continue to implement FreightNYC •

FreightNYC is the City's strategic freight infrastructure plan, outlining near- and long-term investments needed to secure a well-functioning and sustainable goods movement system. This includes new and improved marine terminals, enhanced rail freight capacity, and modernization of distribution hubs across the five boroughs. The City will implement this plan incorporating lessons learned from the pandemic on needs related to the food and health sectors.

Continue to modernize Hunts Point

The Hunts Point Food Distribution Center (FDC) comprises over 155 public and private food wholesalers, distributors, and manufacturers, and accounts for 12% of the last-mile food distribution in the city. The City will continue to support the modernization of the FDC by implementing resiliency measures throughout, supporting a variety of freight transportation options, and supporting tenant redevelopment plans.

Strengthen the city's Industrial Business Zones

As the city's economy has expanded and diversified, maintaining a supply of space for all necessary uses in NYC has become increasingly challenging. A failure to sustain enough space for industrial and logistics functions would have the potential to disrupt industrial supply chains, inflate the price of industrial space, and threaten the viability of other industrial businesses and the jobs they provide. The City will build on the commitments contained in the 10-Point Industrial Action Plan to protect and strengthen industrial business zones, including limiting hotel and self-storage facilities and not supporting private applications for residential zonings in Industrial Business Zones (IBZs), to support the availability of the space and real estate stability food businesses need to operate and thrive. Strategies such as those described in the City's North Brooklyn Industry and Innovation Plan, including increased floor-area ratio and more flexible parking and loading requirements, may help support stability and growth in IBZs or other industrial areas experiencing rising demand for space.

Pursue development of critical food supply chain facilities

The City will prioritize a range of tools to encourage the retention, development, and expansion of the following types of supply chain investments in NYC: co-packing facilities, meat and dairy processing facilities, rentable shared cold storage facilities, and urban production of niche produce. The City will leverage its own properties to ensure that key food hubs across the five boroughs, such as Hunts Point, Brooklyn Terminal Market, Sunset Park, and Maspeth have the resources and capacities to support the packing, processing, cold storage, and manufacturing activities required by food businesses.

Support federal funding for infrastructure • •

The federal government has historically played an important role in funding infrastructure, including freight infrastructure. The City has been consistently advocating for an increase in federal funding and local authority for critical infrastructure investments in order to meet the challenges of climate change, promote equitable growth, and improve public health. In supporting a clean infrastructure agenda we can ensure that distribution networks for food are resilient and can help support local plans for food distribution, such as through the development of food hubs and maritime terminals.

Support the development of borough and neighborhood-based food hubs, starting with the Central Brooklyn Food Hub

The City will explore ways to develop neighborhood-based food hubs to expand fresh food access in high-need areas and reduce traffic congestion. These food hubs will foster a hub-and-spoke model for connections with neighborhood food retail businesses but be at different scales and will emphasize different elements of food distribution, depending on neighborhood needs and development opportunities. To facilitate more flexible food spaces, the City will explore zoning tools that may enable a more flexible mix of retail, food distribution, and food processing to permit the development and operation of small-scale distribution spaces in or near residential or commercial areas, as well as regulatory support and incentives for low-intensity vehicles to facilitate last-mile connectivity, including electric bicycles, e-trikes, and other small cargo vehicles. Additionally, the City will support the proposal to the State to develop a neighborhood food hub in Central Brooklyn.

A STRONGER FOOD SYSTEM REQUIRES INCREASING FOOD DISTRIBUTION CAPACITY WITHIN THE CITY.

Improve regional coordination and sourcing.

Partner on a regional institutional food demand analysis •

Regional farmers and food producers may have capacity to meet much of the regional demand for food, but it can be hard for them to compete with large agribusinesses. One way to help level the playing field is by increasing transparency around institutional demand for food so that regional farmers and producers can work together to meet that demand. To that end, the City will publicly share information about its own food procurement needs and will partner with other major institutions in the city and the region to do the same, creating a more detailed picture of institutional food demand that can support regional food planning.

Increase the share of regional food the City purchases • 🍑

In the next 10 years, the City will aim to significantly increase the share of food it purchases directly from local or regional sources. First, the City will seek to expand the share of food it purchases from the New York region consistent with applicable law. The City will also work to share information on upcoming bids across the region to increase the number of bidders on City food contracts. In the longer term, the City will explore legislation that will allow it to prioritize regionally produced food. Finally, the City will partner with other institutions in the region that have already committed to implement the Good Food Purchasing Program to encourage more institutions and governments in the region to implement the program.

Promote the creation of regional food aggregation centers

To enable NYC-based consumers to gain access to more regionally produced food, the City will work with its regional partners to promote the creation of regional food aggregation centers. Regional food aggregation centers will allow small-scale farmers to aggregate their supply and compete for large-scale food purchases. It could also help increase the number of qualified bidders for the City's own food contracts, including New York State bidders.

Advance educational and other partnerships between NYC institutions and regional farms ●

The City will promote educational and other partnerships to directly connect large NYC institutions such as hospitals and universities with farms across the region. These partnerships will prioritize farms that are

accessible to transit and that employ Black and Indigenous staff and integrate culturally rooted farming practices. Examples of programmatic support may include tours of farms, workforce development training for those interested in gardening, farming, and food business entrepreneurship, and "meet the farmer" events at schools, public housing campuses, libraries, and other City-operated sites.



3C.

Support increased urban farming.

Remove barriers to urban farming •

The City will launch a review of existing laws, regulations, and policies to identify opportunities to streamline processes and remove regulatory barriers related to the operation of urban farming and organic waste processing on lands that are not public parks. This may include reviewing regulations related to land use and exploring different nonprofit and for-profit operating models and mechanisms to distribute micro-grants more efficiently. The City will also seek to work with the U.S. Department of Agriculture (USDA) and other stakeholders to support urban farmers to complete the Census of Agriculture, helping connect urban farms with federal resources.

Explore new spaces for urban farming

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The City will explore creative ways to identify more land for urban farming. In the near term, the City will explore new and existing models to leverage City assets to establish new urban agricultural opportunities. Specifically, the City will focus on neighborhoods with limited access to fresh and affordable produce, and where new and innovative urban farming initiatives may help address food insecurity. In the longer term, as land use may change, the City may explore additional sources of land, such as the use of floodplain areas that are intentionally kept fallow and small or irregularly-shaped lots not suitable for developable uses. The City will also advocate for productive green roof requirements on new commercial developments receiving State tax subsidy.

Expand Farms at NYCHA

Since 2013, NYCHA has partnered with the Mayor's Office, Green City Force, and other public and private partners on this cross-cutting initiative that expands healthy food access, provides youth workforce and leadership development, and helps create more sustainable public housing communities. Through partnerships, NYCHA will expand the number of farm sites from 6 to 15, ensuring there are at least two farms in each borough within five years. NYCHA will expand work with backbone partner Green City Force and collaborate to explore new farm models, including those that incorporate entrepreneurship, composting, and greenhouses. Working with citywide and local farm partners, NYCHA will identify sources of sustainable funding to enrich and preserve this internationally-recognized network of farms built by and serving low- and moderate-income New Yorkers.

Pilot innovations in urban farming technologies

To support the technological advances in vertical farming and hydroponics that make possible the highly space-efficient cultivation of produce in industrial and other indoor spaces, the City will partner with researchers, philanthropy, and industry stakeholders to pilot opportunities to bring down the cost and energy intensity of these technologies to make their deployment and operation more feasible, equitable, and sustainable.



MAYORAL PHOTOGRAPHY OFFICE



GOAL 4

New York City's food is produced, distributed, and disposed of sustainably.

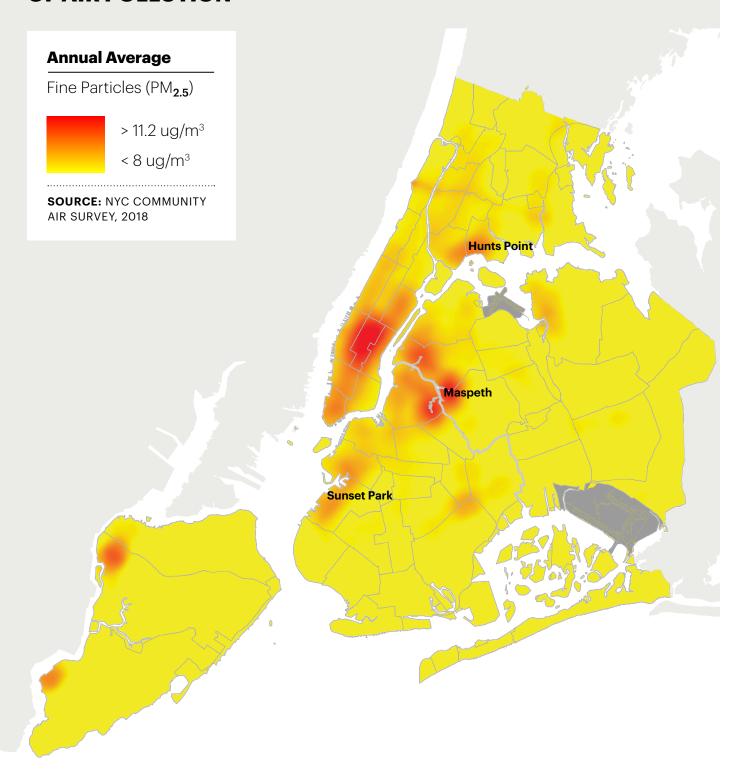
BACKGROUND

The food system that feeds New Yorkers has a huge impact on the environment. In the United States, the agricultural sector, including farms and livestock production, accounts for 10% of carbon emissions.⁹ The growing, processing, transportation, cooking, and packaging of food contributes to pollution in the air, water, and soil; depletion of natural resources and ecosystems;¹⁰ and overuse of antibiotics, leading to increases in antibiotic resistant bacteria.¹¹ Too much food waste and food packaging ends up in landfills, with some single-use plastics taking over 1,000 years to break down.

These negative impacts are disproportionately felt by communities of color. For example, migrant farm workers are often exposed to high levels of pesticides and other agricultural chemicals. Hunts Point, a largely Hispanic/Latinx community with one of the largest youth populations in the city, has some of the highest adult and child asthma hospitalizations of any neighborhood in New York City. It also has very high rates of air pollution, in part due to truck traffic feeding one of the world's largest food distribution centers. Across the United States, commercial hazardous waste facilities like waste processing and transfer stations are much more likely to be built in predominantly Black and Latinx neighborhoods. All of these systems extract wealth, nutrients, value, and health from communities and the planet.

A sustainable food system is regenerative rather than extractive in nature. It allows natural ecosystems and human cultures and communities to thrive. It helps us achieve carbon neutrality by 2050 while acknowledging and addressing environmental injustices. For a dense, urban environment, a sustainable food system must also create meaningful connections between New York City's residents and the communities and ecosystems that feed them. The following strategies will build on existing City and community efforts to ensure that New York City's food is produced, distributed, and disposed of sustainably.

SOME OF THE CITY'S MOST IMPORTANT AREAS FOR FOOD DISTRIBUTION ALSO HAVE SOME OF THE HIGHEST RATES OF AIR POLLUTION



STRATEGIES





4A.

Integrate sustainability and animal welfare into City food programs.

Include sustainability criteria in commercial waste zone contracts

In October 2019, the New York City Council passed the Commercial Waste Zones bill, which divided the city into zones served by up to three private waste haulers, which manage non-residential waste. Once in effect, private waste haulers vying for a zone will be required to submit business proposals that will be evaluated by the City. The City will leverage this opportunity to encourage private haulers to adopt more sustainable practices by including criteria such as cleaner trucks and organic waste collection targets in the proposal review process. Given that small businesses pay more per pound for waste collection today, this new program will also consider ways to have the largest waste producers pay their fair share.

Explore ways to integrate sustainability and animal welfare into City food procurement • • • •

Initially, in accordance with the limitations placed on it by law, the City's focus on reducing greenhouse gas emissions and nutrition and food quality standards may have incidental and indirect impacts on animal welfare and other environmental issues. In the longer term, the City will explore legislative changes to allow the City to directly address a broader range of environmental and animal welfare challenges through its food procurement and pursue increased budgets where ethical and environmentally friendly practices lead to higher costs.

Pursue federal dietary recommendations that consider environmental sustainability in the 2025-2030 Dietary Guidelines for Americans

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Every five years, the federal government publishes the Dietary Guidelines for Americans, which establishes the standard for Americans' diet. Previous guidelines have not included sustainability criteria, despite the impacts of the food system on long-term sustainability. The City will pursue the inclusion of dietary guidelines on sustainability in the next version of the guidelines, covering 2025-2030.

Collect 90% of citywide organic waste by 2030 ●

To support the City's goal of reducing the amount of waste it sends to landfills by 90% by 2030, the City will mandate the source separation and recycling of organic waste within all city institutions and schools by the year 2025 and in all residential buildings by 2029. The City will also expand the number of commercial establishments that are required to recycle their organic waste to include all businesses with a significant production of food waste. Additionally, the City will work with the design community and environmental justice advocates to find ways to improve and support new and existing infrastructure and procedures to support sanitary source separation of organics and recyclables with special focus on communities that are disproportionately burdened by waste infrastructure, NYCHA developments, affordable and shelter housing, and public schools.

A SUSTAINABLE FOOD
SYSTEM IS REGENERATIVE
RATHER THAN
EXTRACTIVE IN NATURE.

4B.

Reduce in-city air pollution and greenhouse gas emissions from the food system.

Explore ways to make cold storage locations more energy efficient •

Cold storage is essential for a healthy and functioning food system and can reduce food waste by keeping items fresher for longer. However, refrigeration is incredibly energy intensive. The City will work with property owners and organizations with high refrigeration needs to make their buildings and appliances more efficient, invest in low-cost renewable energy, and reduce operating costs. By sealing leaks and cracks and adding insulation, refrigerated spaces need less energy to keep cold. Installing solar panels and battery storage on warehouse and grocery store roofs can reduce energy costs and provide back-up power in case of an outage. These efforts will help build supply chains that are affordable for businesses to maintain, resilient, and beneficial to the health and well-being of NYC's communities.

Plan for a cleaner, more efficient, and more resilient food transportation network ●

To reduce the environmental impact of food transportation, the City is implementing Freight NYC, which will assist in increasing the share of lower-emission rail and maritime freight. The City will also work to reduce the environmental impact of trucks. To achieve this, the City will need to expand electric charging infrastructure for trucks and smaller vehicles and re-envision the street and curb space to create room for clean micromobility options for last-mile delivery. The City will build on the success of

its cargo bike program for the last mile of food deliveries through strategic partnerships, and engage with electric vehicle and micro-mobility industry stakeholders, utilities, and large institutions in NYC to strategically expand charging infrastructure, centering on the needs of environmental justice in communities.

Partner with utilities to incentivize electrification and improve air quality

To achieve carbon neutrality by 2050, most of the city's energy will need to come from electricity, not fossil fuels burned on-site. The City will work with utilities to find ways to incentivize homes to switch from gas cooking to clean induction cooking, which can improve indoor air quality. The City will also focus on transport refrigeration units (TRU), which are trailers that are often parked outside food distribution centers burning diesel fuel to keep their contents cold. It will work with utilities to survey TRU usage in the city, assist with connecting to the electric grid, and ensure financial support for the transition to electricity. The City will also help establish relationships between wholesalers, grocery stores, and other large food businesses and the electric utility in order to increase uptake of utility electrification incentives.

4C.

Promote innovation around food and sustainability.

Advocate for the inclusion of local seafood and seaweed in the New York State Grown & Certified program ● ♥

The New York State Grown & Certified program is a program that makes it easy for consumers to identify local, safely-handled, and environmentally responsible agricultural products. The City will advocate to expand the reach of the program to include sustainably and locally harvested seafood and seaweed. Products like oysters and kelp have numerous sustainability and resiliency benefits, as they can help clean the State's waterways, sequester carbon, and reduce the impact of coastal storms.

Create national research-informed standards for expiration dates on food products • •

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Expiration date labels are not standardized and may not consistently or accurately indicate whether a food item is safe to eat. This results in large quantities of unnecessarily wasted food,¹⁶ the costs of which are borne by consumers. The City will push for the creation of national, data-informed

standards for expiration dates on food products that will limit food waste and save consumers money.

Explore ways to reduce use of single-use items in food service

The City will pursue public-private partnerships, legislative pathways, and City procurements to test innovative strategies to reduce single-use items without putting undue burden on small businesses or on diners, particularly people with disabilities. To better understand the magnitude of the issue, the City will model how many single-use items are being used and thrown away or recycled per year to identify potential pathways to reduction. The City will also explore partnerships to pilot a standardized take-out/delivery container and utensils that can be used and exchanged or recycled at a variety of food service establishments, while working with the Department of Health to maintain the highest health and safety standards. In addition, City agencies serving food will also consider strategies to reduce single-use items and packaging in City-provided meals.

Pursue legislative action to reduce the impacts of packaging and single-use items ● ♥

The City will work with the State and the City Council to introduce legislation that addresses single-use items in food service holistically, rather than by individual item. Legislative options could include expanding Extended Producer Responsibility to food packaging manufacturers and fossil fuel companies.

Bolster community-owned waste management initiatives

The City is responsible for ensuring that waste is collected and managed citywide, including mitigating any burdens the waste system imposes, particularly on communities of color. However, the City also has the opportunity to bolster community-led waste management initiatives that meet the unique needs of communities. The City will provide technical support to groups that divert waste from landfills while creating local regenerative food systems on their own terms. In addition, the City will aim to identify and address barriers to community-level salvage operations or businesses, composting, regenerative agriculture, micro-digesters, and other community-level and community-owned waste management solutions. Particular attention will be given to groups operating within NYCHA and other communities that have suffered from historical disinvestment and environmental burdens. The City will learn from models in other cities, such as Chicago's Green Era community biodigester, which will serve as a brownfield remediation resource, community food access hub, education and training facility, source of renewable energy, and regenerative farm site.¹⁷



GOAL 5

Support the systems and knowledge to implement the 10-year food policy plan.

BACKGROUND

New York City's food system is highly distributed and fragmented, made up of many small parts that interact with each other in complicated ways. In fact, the system is so complex that even people who have spent years working in one sector of the food system often have little to no knowledge of how the rest of it works. It is not surprising that it can be extremely hard for anyone who plays a role, from policymakers to food workers to advocates to food consumers, to understand what levers to push for systemic change. This complexity also makes meaningful community engagement and decision making around food very challenging.

In order to implement the 10-year food policy plan, many stakeholders from different parts of the food system will need to work together in ways they have never done before. They will need opportunities to connect with and learn from one another. They will need to be able create and share new knowledge and data about the food system. And of course, they will need to have access to different pathways to make decisions about the food system.

The following strategies will expand the range of tools and knowledge available for all New Yorkers to participate in the food system. The City's ability to coordinate multi-sectoral food policy will help foster partnerships with advocates and residents on all food matters.



STRATEGIES



LONG TERM





Strengthen community engagement and cross-sector coordination around the development and implementation of food policy.

Deepen regional engagement through a NYC Regional Food Working Group

The City has launched a NYC Regional Food Working Group, bringing together stakeholders from across the region to discuss regional food policy. This group will serve as an opportunity for the City to report to the region on its food policy and hear back from regional stakeholders. It will also serve as an opportunity to develop a shared policy agenda that members can advocate for together and tangible partnerships to realize that agenda. This will include developing shared federal policy priorities around food, particularly around the 2023 farm bill.

Partner with the non-governmental sector to maximize community participation in food policy decision-making

Public engagement on food presents unique challenges given the many interactions of food with residents' daily lives and the difficulty in knowing what opportunities there are for residents to engage with the food system. To develop a durable and effective long-term engagement strategy that promotes equity, the City will work with food advocates to launch a shared working group focused on engagement. The working group will help to map out City processes and identify both immediate and long-term opportunities for engagement. The City is committed to modeling such a strategy through its work with the Good Food Purchasing coalition.

Launch a Public Housing Food Leadership Innovation Lab

In recent years, NYCHA has worked in collaboration with a diverse set of partners to activate projects at the intersection of food access, food production, food waste management, community building, leadership development, and entrepreneurship. NYCHA will seek to formalize this through the establishment of a Public Housing Food Leadership Innovation Lab that will serve as a base from which projects (many of which are directly connected to and aligned with other goals in the plan) can be tested, refined, scaled, integrated, and positioned for sustainability. The lab's primary values will be equity and sustainability. Core functions will

include activity that serves to test, refine, and scale successful partnerbased projects; activate partners with aligned missions and capacity to serve public housing communities; maintain consistent metrics and tracking; and advance knowledge transfer with other public housing authorities, cities, and additional relevant stakeholders.

Explore the creation of a food justice fund •

Cities across the country are developing food justice funds, utilizing participatory processes to allocate funding to community driven food projects. The City will partner with food stakeholders and philanthropy to explore the possibility of creating a food justice fund, including identifying potential funding sources and developing equitable and transparent criteria for the distribution of the funds.

STAKEHOLDERS FROM DIFFERENT PARTS OF THE FOOD SYSTEM **NEED TO WORK TOGETHER** IN WAYS THEY HAVE NEVER BEFORE.

Create and share knowledge about the food system.

Improve and share the City's food procurement data ••



As part of its commitment to the Good Food Purchasing Program, the City will work to collect better data and information on its own food procurement. This will include collecting full data on its direct food purchases, developing ways to collect data about the food purchased through third-party service providers, and sharing the information collected publicly.

Conduct a regional food flow study and enhance stakeholder engagement for emergency management

To mitigate future hazards to the City's food supply chains, including natural and human-caused risk, the City will conduct a food flow study that will identify different sources of food and vulnerabilities in the City's food supply. Using the study, the City will continue to refine and update its emergency preparedness plans in coordination with key stakeholders in the food sector and create new systems and structures that can be activated during an emergency to address these hazards. The City will also deepen its engagement with the food sector around emergency management.

Develop measures that capture multiple dimensions of food insecurity

New Yorkers' food needs are highly unique, depending on cultural preferences, religious and dietary needs, medical requirements, and



personal values. Furthermore, the ways in which New Yorkers access food vary greatly depending on their specific circumstances. Successful interventions to reduce food insecurity need to consider these many dimensions, yet existing data on food insecurity tends to be very high level, making it harder to design and evaluate policy interventions. To fill this gap, the City will work with community organizations and the academic sector to develop new publicly available measures of food insecurity that will be incorporated into the City's annual Food Metrics Report and that will inform new policies.

Partner with the private and civic sectors on food education campaigns around sustainability and nutrition •

A major challenge in advancing food policy in New York City is the lack of a shared knowledge base around food, resulting from the complex and fragmented nature of the system. To address this challenge, the City will leverage its convening power to encourage broader food education around a variety of areas related to food. In the sustainability field, opportunities may include convening private sector partners to develop sustainable food campaigns (such as an "ugly fruit" campaign) and support and expanding opportunities for climate and sustainable food literacy, including in K-12 schools. On nutrition, the City will continue to combat predatory food marketing practices targeted at youth, support breastfeeding parents through public campaigns, and advance schoolbased health education, including nutrition education and wellness policies. Additionally, the City will push the State to develop school curriculum development covering food, agriculture, and climate change and fund sustainable food education projects that bring together urban and rural populations.

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Strategy	Action	Legislative	GFPP
NEAR TEI	RM: IMPLEMENTATION STARTS 2021-2022		
	Launch a new food program to address food security issues exacerbated by the pandemic		
1A	Expand "Get the Good Stuff"		
	Include whole families in summer meal programs permanently	Ø	
	Pursue federal and state action to expand and improve SNAP and other food benefits	Ø	
1B	Transform the emergency food network		
	Enable food retailers to utilize more outdoor space		
	Evaluate options to limit exposure to unhealthy food and food marketing	Ø	
	Enforce fair scheduling laws in fast food		
2A	Create financing and technical assistance plans to support worker-owned cooperatives		
2B	Push for a NYC Small Business Recovery Tax Credit for small businesses including food businesses	Ø	
2C	Launch a Food Community Hiring Initiative		4
	Continue to implement FreightNYC		
3A	Continue to modernize Hunts Point		
3B	Partner on a regional institutional food demand analysis		
4A	Include sustainability criteria in commercial waste zone contracts		
	Deepen regional engagement through a NYC-Region Food Working Group		
5A	Partner with the non-governmental sector to maximize community participation in food policy decision-making		
5B	Improve and share the City's food procurement data		
36	Conduct a regional food flow study and enhance stakeholder engagement for emergency management		
1EDIUM	TERM: IMPLEMENTATION STARTS 2023-2024		
	Make it possible to leverage healthcare coverage for medically tailored meals		
1A	Pursue federal and state change to expand the reach of produce prescription programs	Ø	
	Partner with health systems to increase access to healthy foods		
	Explore new ways to expand farmers' markets and other programs that bring fresh fruits and vegetables to underserved communities		
	Support breastfeeding parents in hospitals, workplaces and community settings		
1B	Pursue federal support for businesses and nonprofits that provide fresh produce in underserved communities	Ø	
	Study ways to improve access to cold storage in underserved communities		
	Improve cafeteria culture in public schools		
1C	Create a shared commercial kitchen for providers serving older New Yorkers		
10	Push for changes in state procurement law		ď
	Push for state and federal change that improves the condition of workers in the food industry	⊘	
2A	Support the workers that supply the City's food programs		4
	Explore ways to expand the City's existing childcare programs to include night care for children of food service workers		
	Streamline regulations and enforcement processes related to food businesses		
0.0	Support NYCHA food entrepreneurs		
2B	Advance initiatives that protect food business and customer data		
	Push for expanded and new state and federal programs that support the needs of food businesses and cooperative efforts		

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strategy	Action	Legislative	GFPP
IEDIUM	TERM: IMPLEMENTATION STARTS 2023-2024	1	
2C	Support training for food technology careers		
	Support the creation and expansion of career pathways in the food sector		
	Create workforce development programs for school food workers		
3A	Strengthen the city's Industrial Business Zones		
	Pursue development of critical food supply chain facilities		
	Support federal funding for infrastructure		
3B	Increase the share of regional food the City purchases		ď
	Remove barriers to urban farming		
3C	Explore new spaces for urban farming		
	Expand Farms at NYCHA		
	Explore ways to integrate sustainability and animal welfare into City food procurement	Ø	४
4A	Pursue federal dietary recommendations that consider environmental sustainability in the 2025-2030 Dietary Guidelines for Americans	Ø	
4B	Explore ways to make cold storage locations more energy efficient		
	Explore ways to reduce use of single-use items in food service		
4C	Advocate for the inclusion of local seafood and seaweed in the New York State Grown & Certified program	Ø	
	Create national research-informed standards for expiration dates on food products		
	Pursue legislative action to reduce the impacts of packaging and single use items	Ø	
5A	Launch a Public Housing Food Leadership Innovation Lab		
	Develop measures that capture multiple dimensions for food insecurity		
5B	Partner with the private and civic sectors on food education campaigns around sustainability and nutrition		
ONG TE	RM: IMPLEMENTATION STARTS 2025 +		
45	Explore ways to increase the amount of freshly prepared meals in public schools	⊘	6
1B	Explore new partnerships with schools around food access		
	Explore new ways to centralize and improve City food procurement		4
1C	Study the viability of food hubs that expand public schools' access to cold storage, processing space, and preparation capacity	Ø	5
2A	Conduct a feasibility study on ensuring basic social safety net benefits	Ø	
2B	Make it easier for vendors to participate in City food procurement.		4
ЗА	Support the development of borough and neighborhood-based food hubs, starting with the Central Brooklyn Food Hub	Ø	
3В	Promote the creation of regional food aggregation centers		6
	Advance educational and other partnerships between City institutions and regional farms		
3C	Pilot innovations in urban farming technologies		
4A	Collect 90% of citywide organic waste by 2030		
	Plan for a cleaner, more efficient, and more resilient food transportation network		
4B	Partner with utilities to incentivize electrification and improve air quality		
4C	Bolster community-owned waste management initiatives		
5A	Explore the creation of a food justice fund		

ACKNOWLEDGEMENTS

We would like to thank the following organizations for contributing their knowledge and staff time in the development of the plan:

32BJ SEIU Serving Up Justice Campaign

Accion East

Acme Smoked Fish

AHRCNYC

American Dairy Association New

England

American Farmland Trust

Baldor Specialty Foods

Beautifully Fed Food

Bedford Stuyvesant Restoration

Corporation

Binghamton University, SUNY

BMS Family Health and Wellness Centers

Broadway Community

Bronx Eats

Bronx Health REACH

Bronx Impact Food Access

Coalition

Brook Park Youth Farm

Brooklyn Brewery

Brooklyn Grange

Brooklyn Movement Center

Brooklyn Packers

Brooklyn Relief Kitchen

Brooklyn-Queens Land Trust

Business Outreach Center Network

C&S Wholesale Grocers

Cabot Creamery Cooperative

CADE Farms

Cafeteria Culture

CALSTART

CCD75

Center for Agricultural Development and Entrepreneurship

Center for Good Food Purchasing

Central Brooklyn Food Co-op

CHFGMA

Chilis on Wheels

Citizens Committee for Children

City Council

City Harvest

CMW Strategies

Collective Fare

Columbia Teachers College Tisch Center for Nutrition Education

Community Food Action

Community Food Advocates

Connecticut Department of

Agriculture

Cooperative Economics Alliance of

NYC

Corbin Hill Food Project

Cornell Cooperative Extension

Cornell University

Council of Peoples Organization

Crist Apples

CUNY Urban Food Policy Institute

Cypress Hills Local Development

Corporation

Doe Fund

Doris Duke Foundation

Down to Earth Farmers Markets

Drive Change

Dutchess County Planning and

Development

EarthJustice

East End Food Institute

Eden Valley Growers, Inc.

Edible Schoolyard NYC (ESYNYC)

Ellen MacArthur Foundation

Emergency Management
Empire Clean Cities

Empire State Development

Corporation

Enterprise

Evergreen Exchange

Farm School NYC

Food Bank For NYC

Food Bazaar

Food Chain Workers Alliance

Food Industry Alliance of New York

FoodCorps FoodStream

Fresh Direct

Good Food Purchasing Center

Gotham Greens

Great Performances

Greater Jamaica Development Co.

Green City Force

GrowNYC

Happa Kitchen

Headwater Food Hub

HealthFirst

Hot Bread Kitchen

HR&A

Hudson Valley AgriBusiness

Development Corp

Hudson Valley Pattern for Progress

Hunger Free America

Hunter College NYC Food Policy

Center

Institute for Family Health
Interfaith Medical Center

Isabahlia Ladies of Elegance Foundation

Just Food Just Salad

Karen Karp & Partners (KK&P)

Lemon Tree

LiveOn NY

Local Roots NYC

Long Island Farm Bureau

Low Income Investment Fund

Lunch 4 Learning (L4L)

Make the Road New York Meals for Good

Merck Family Fund

Met Council MetroPlus

National Supermarket Association

Natural Resources Defense Council

New Creation Community Health

Empowerment Inc

New Jersey Economic

Development Authority

New Jersey Food Processors

Association

New Settlement

New York Apple Association New York Community Garden

Coalition

New York Community Trust

New York Department of Agriculture & Markets

New York Farm Bureau

New York Immigration Coalition New York State Department of

Transportation

New York State Vegetable Growers

Association

No Kid Hungry New York
North Star Fund

NY COVID19 Food Coalition

Equity Advocates

NY Farm Viability Institute

New York State Health Foundation
NYC Good Food Purchasing

Coalition

NYC Hospitality Alliance

NYS Department of Agriculture

NYU Stern School of Business One Brooklyn Health / Interfaith

One Fair Wage

Medical Center

Ovenly

P721K /D75 President Council

Pratt Institute - Graduate Center for Planning and the Environment

Project EATS

Public Health Solutions

QJM Multiprise Red Rabbit

Regional Plan Association

Reinvestment Fund

Retail, Wholesale and Department Store Union (RWDSU)

Rethink Food

Rise & Root Farm

Riseboro Community Partnership

Robin Hood

ROC United

Rockaway Initiative for

Sustainability and Equity (RISE)
Rockefeller Foundation

Rutgers Innovation Center

Seed 2 Space

Seeds in the Middle Shachar Foundation

SOBRO (South Bronx Overall Economic Development Corp.)

SolidarityNYC

South East Asia Food Group

Southside United HDFC - Los Sures

Square Roots

Staten Island for North Shore Children and Families

Street Vendors Project

Suffolk County Economic Development and Planning

SUNY Downstate School of Public Health

Teens for Food Justice

The Bronx Community Foundation

The Campaign Against Hunger

The Children's Aid Society

The Point CDC

The Salvation Army

The Common Market

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Urbane Development

Watershed Agricultural Council

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- **1.** "The Impact of Coronavirus on Food Insecurity. Feeding America. October 2020. https://www.feedingamericaaction.org/the-impact-of-coronavirus-on-food-insecurity/.
- 2. "Map the Meal Gap." Feeding America. 2018. https://map.feedingamerica.org/.
- **3.** Robin Hood PovertyTracker data. Results produced by the Center on Poverty and Social Policy and Columbia University. 2018.
- **4.** "American Community Survey 2014-2018 5-Year Estimates." 2019. https://www.census.gov/programs-surveys/acs/data/summary-file/2018.html.
- **5.** The Restaurant Industry in New York City: Tracking the Recovery." Office of the New York State Comptroller. 2020. https://www.osc.state.ny.us/files/reports/osdc/pdf/nyc-restaurant-industry-final.pdf.
- **6.** "County Business Patterns." United States Census Bureau. 2017. https://www.census.gov/programs-surveys/cbp.html.
- 7. "Quarterly Census of Employment Wages, New York City". New York State Department of Labor. 2019. https://labor.ny.gov/stats/lsqcew.shtm. Wages by industry (as opposed to occupation) are available from the DOL only as averages as opposed to medians.
- **8.** Horton, Radley et al. "Ch. 16: Northeast." Climate Change Impacts in the United States: The Third National Climate Assessment (2014): 371-395. doi:10.7930/JOSF2T3P.
- **9.** "Sources of Greenhouse Gas Emission: Agriculture." United States Environmental Protection Agency. https://www.epa.gov/ghgemissions/sources-greenhouse-gas-emissions#agriculture.
- **10.** Nesheim M.C., Oria M., Yih P.T. "4, Environmental Effects of the U.S. Food System." A Framework for Assessing Effects of the Food System. Committee on a Framework for Assessing the Health, Environmental, and Social Effects of the Food System; Food and Nutrition Board; Board on Agriculture and Natural Resources; Institute of Medicine; National Research Council. National Academies Press (June 17, 2015). https://www.ncbi.nlm.nih.gov/books/NBK305182/.
- **11.** Landers, Timothy F. et al. "A review of antibiotic use in food animals: perspective, policy, and potential." Public Health Reports (2012 Jan-Feb). 127(1):4-22. doi:10.1177/003335491212700103.
- **12.** "Exposed and Ignored: How pesticides are endangering our nation's farm workers." Farmworker Justice (2013). https://kresge.org/sites/default/files/Exposed-and-ignored-Farmworker-Justice-KF.pdf.
- **13.** "Environment & Health Data Portal: Summarize." City of New York. http://a816-dohbesp.nyc.gov/IndicatorPublic/VisualizationData.aspx?id=2386,4466a0,11,Summarize.
- **14.** Mohai, P., Saha, R. "Which came first, people or pollution? Assessing the disparate siting and post-siting demographic change hypotheses of environmental injustice." Environmental Research Letters (November 2015). https://iopscience.iop.org/article/10.1088/1748-9326/10/11/115008.
- **15.** Imbler, Sabrina. "Kill Your Gas Stove." The Atlantic (October 15, 2020). https://www.theatlantic.com/science/archive/2020/10/gas-stoves-are-bad-you-and-environment/616700/.

- **16.** Davenport, M., Qi, D., Roe, B. "Food-related routines, product characteristics, and household food waste in the United States: A refrigerator-based pilot study." Resources, Conservation and Recycling 150 (2019): https://doi.org/10.1016/j.resconrec.2019.104440.
- **17.** Ramos, Manny. "An urban farm to bring green energy, jobs to South Side. Chicago Sun Times (August 7, 2020). https://chicago.suntimes.com/business/2020/8/7/21357970/urban-farm-green-energy-auburn-gresham-state-grant.







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