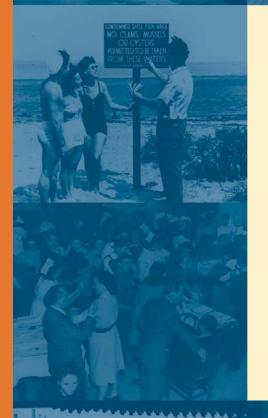
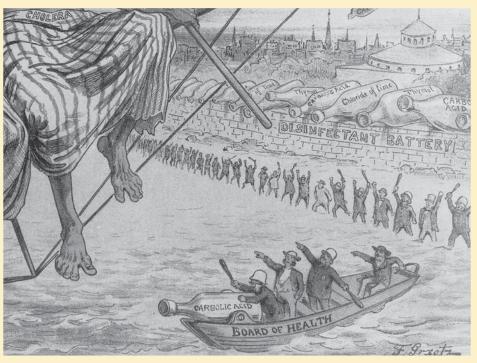
### PROTECTING PUBLIC HEALTH IN NEW YORK CITY: 200 YEARS OF LEADERSHIP





1805-2005

/ /

THE NEW YORK CITY DEPARTMENT OF HEALTH AND MENTAL HYCIENE

### Protecting Public Health in New York City: 200 Years of Leadership

### 1805-2005



Michael R. Bloomberg Mayor

Thomas R. Frieden, MD, MPH Commissioner



A pril 2005 marks the bicentennial of the New York City Board of Health, the predecessor of the New York City Department of Health and Mental Hygiene. New York City's illustrious history of public health leadership began in the early 1800s, when the city controlled epidemics of Yellow Fever and cholera. In the early 1900s, the Department opened the first public health laboratory that applied bacteriological knowledge to prevent and control disease. In the late 1900s, the Department implemented model programs to fight new and re-emerging infectious diseases. And in the century just begun, we have launched programs to prevent and control major chronic diseases.

The Board's 200th anniversary is an appropriate time for us to review the many public health challenges that the Board and the Department have met over the years, and to reflect on the lessons these experiences hold for our future.  $\sim$ 

hanna Linde

**Thomas R. Frieden, MD, MPH** Commissioner New York City Department of Health and Mental Hygiene

### TABLE OF CONTENTS

1805-1865: Fighting Yellow Fever and Cholera	3
<b>1866-1885:</b> The Birth of the New York City Department of Health	II
1886-1913: Immigration, the Bacteriological Revolution, and Hermann Biggs	17
<b>1914-1922:</b> The Health Department Modernizes	25
<b>1923-1930:</b> Fighting Corruption and Expanding Health Services in the Roaring 20s	31
<b>1931-1940:</b> The Department, the Depression, and the New Deal	35
<b>1941-1949:</b> The DOH in the War Years	39
<b>1950-1969:</b> From Infectious to Chronic Disease	45
<b>1970-1989:</b> From Fiscal Crisis to the AIDS Epidemic	51
1990-2005: New York's Public Health Renaissance	59

# **IB05-I865** FIGHTING YELLOW FEVER AND CHOLERA

OF HEALTH

**1804** City Inspector's Office established to keep mortality statistics

**1805** New York City Board of Health created to combat Yellow Fever epidemics

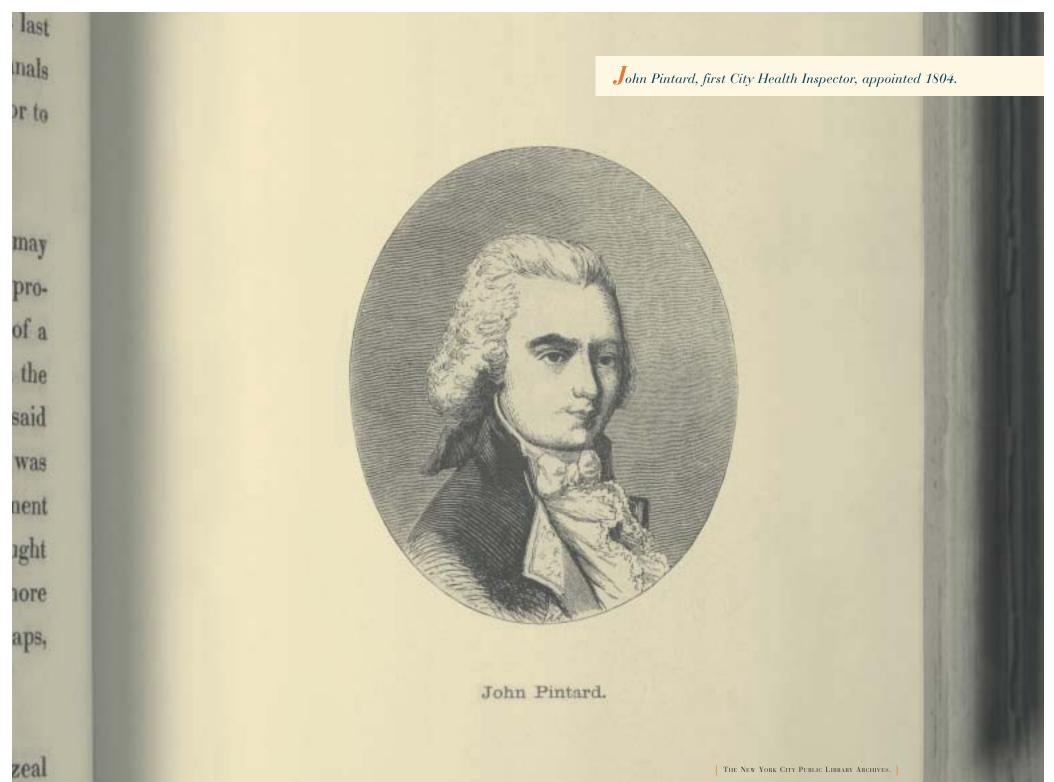
> **1842** City gets fresh water from Croton reservoir

Lellow Fever sparked the formation of New York's first Board of Health. In the summer of 1793, when an epidemic killed 5,000 in nearby Philadelphia, a group of leading doctors in New York organized a committee to prevent boats from Philadelphia from entering New *York's ports.* These quarantine efforts may have helped keep the disease away that summer. But in the summers of 1795, 1799, and 1803, Yellow Fever, which caused victims to develop a yellowed complexion and vomit black bile, felled thousands of New Yorkers. These epidemics lent weight to the view that sanitary measures, and not just quarantine, were needed to curb the disease. The city's Common Council consequently determined that it needed greater authority over local sanitation to control Yellow Fever. So on January 17, 1805, it passed an ordinance to create the first New York City Board of Health, made up of

Mayor De Witt Clinton and a committee of city aldermen.

Over the next half-century, the Board generally took a reactive stance, meeting whenever an epidemic threatened the city. Between outbreaks of disease, city government paid little attention to health. While the Board spent more than \$25,000 fighting Yellow Fever in 1805, its budget dropped to \$1,500 the next year and funds did not increase until the city faced another epidemic in 1819. Between 1822, the last time Yellow Fever struck the city, and 1832, when Asiatic cholera reached New York for the first time, the board was inactive. In the 1840s, the board met rarely until cholera again struck the city in 1849. In these early years, public health became a political concern only when disease brought the bustling city to a standstill.

Even in times of dire crisis, the Board proved unpredictable. In 1805, its members



*•Our city presented the* appearance of a town besieged. From daybreak till night one line of carts, containing boxes, merchandise, and effects were seen moving towards 'Greenwich Village' and the upper parts of the city."

James Hardie former secretary of the Board of Health, 1822

acted swiftly when Yellow Fever cases appeared, ordering patients removed to the Marine Hospital on Staten Island, evacuating residents from sections of the city where the disease had struck. and appointing night watchmen to guard abandoned areas. The

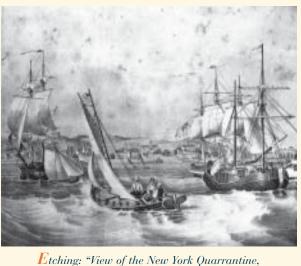
Board also erected a temporary asylum to house poor families that had been evacuated, and provided

rations for families who were starving due to lack of work in the desolate city. Similarly, in the epidemic of 1819, "[i]mmediate measures were adopted to clear the sickly district of its inhabitants, and to fence up the avenues which led to the seat of infection," according to Mayor Stephen Allen. But in 1822, the last time a Yellow Fever epidemic struck New York, the Board hesitated to declare the disease present.

By the time the Board had shut affected areas, most residents, recognizing the disease from previous years, had packed up and moved to temporary homes, banks, and shops in nearby Greenwich MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES Village, which was

then a small town north of the city's limits.

After each epidemic, the City Inspector's office provided a detailed statistical account of mortality. John Pintard, a prominent merchant and former state assemblyman, began privately collecting mortality statistics for New York in



Staten Island," 1851.

1802, and two years later, the city appointed him its first inspector to keep official mortality statistics. Pintard hoped that statistics would increase knowledge of disease among physicians and the general public. The November 1805 City Inspector's Report, he wrote, was designed to "furnish data for reflection and calculation," in order that the "awful malady" of Yellow Fever could one day "become more controllable and less mortal." That year, there had been 600 reported cases and 262 deaths from Yellow Fever. The city inspector's mortality statistics would prove invaluable in demonstrating the gravity of the city's health problems in the 1840s and 1850s.

The arrival of Asiatic cholera stirred the Board to action as the Yellow Fever epidemics had earlier. Upon hearing that cholera was ravaging Europe in late 1831, the Board quarantined ships from Europe and enacted measures

to clean the city's dirty streets. But once cholera cases began to appear in the city, the Board was slow to recognize them, as cholera would interrupt the flow of commerce. The Board was "more afraid of merchants than of lying," one prominent resident, William Dunlap, wrote to a friend that year. During the 1849 epidemic, the Board tried to act, but faced hostility from landlords when it tried to set up a cholera hospital and had to use the second floor of a tavern and four public schools as a makeshift facility. The Board's Sanatory Committee managed to get the police to remove between five and six thousand hogs from crowded tenement areas-a measure thought to reduce diseaseeven after residents rioted in protest. The Board and City Inspector's Office also shut the boneboiling plants that disposed of animal carcasses, as these centrally-located businesses were considered a disease-causing nuisance. But this

"[T]he Irish suffered the most, being ...much addicted to intemperance and crowded together in the worst portions of the city:"

The New York Board of Health commenting on the 1832 cholera epidemic.

7



{FROM HARPER'S WEEKLY, AUGUST 5, 1865 (NATIONAL LIBRARY OF MEDICINE)}

just meant that the carcasses were thrown into the river to rot near the docks.

As wealthier residents fled to the country during the cholera epidemics, the disease was left to ravage the poor, mostly free blacks and

Of the 5,017 who died during the 1849 epidemic, a full 40 percent had been born in Ireland. While the city had absorbed just over 92,000 immigrants between 1820 and

Irish immigrants.



Members of the Board of Health meet to receive reports, 1866. {Illustration From Leslie's Monthly (www.livingcityarchive.com)}

1830, over 1.1 million arrived between 1840 and 1850, and 1.2 million between 1850 and 1860. Many middle-class Germans and other Europeans arrived in these years, but most immigrants were fleeing famine-starved Ireland. The Irish soon occupied the increasingly crowded districts of New York centered on the Five Points neighborhood. Immigration fueled demand for housing and led unscrupulous landlords to erect tenements such as one on Mulberry Street

WWW.LIVINCCITYARCHIVE.COM\*800 persons crowd-ed upon two lots,ed upon two lots,six persons livingin almost everyroom." The squalorof tenements spilledonto the city streets;corrupt city officialsawarded street clean-awarded street clean-

that by 1849 had

expectation that the jobs would get done. The streets were filled with rotting garbage, dead animals, and overflowing human and animal waste. Hogs, dogs, and other animals ran wild

### 1850 Annual Mortality Rates: Lowell, Mass. 1 in 65 Providence, Rhode Island, 1 in 47 New York City: 1 in 38

Average Age of death in New York 20 years and 8 months

Leading Causes of Death: Consumption (tuberculosis); convulsions; stillborn infants; inflammation of the lungs; dysentery; marasmus (malnutrition); typhus; cholera; diarrhea.

1851 City Inspector's Report

••/ W e cannot fail to note the marked increase in the death rate, year by year, for nearly twenty years past .... There is reason to believe that all this increase of the death-rate is caused in particular classes of inhabitants. It is found to be mainly in those classes from which the paupers are derived, viz the ignorant and poor classes .... Already we know that, as regards periods of life, the excess of mortality is in children under five years of age." Dr. Elisha Harris Metropolitan Board of Health, November 19th, 1866

in the poorer neighborhoods. The city had little incentive to curb the hog population, as these scavengers were the only effective street cleaners.

The 1832 cholera epidemic, which even then was known to be associated with dirty water, did spur one civic improvement. In the following years, the city's Common Council ordered water commissioners to draw up a plan for an aqueduct to bring clean water to the city, which voters later approved. The Croton Aqueduct and reservoir, which brought water from the Croton River to the city's pipe system, opened on October 14, 1842 at a cost of \$11.5 million. The water was used for drinking and street cleaning, although the Croton Water Board objected, even during the 1849 cholera epidemic, to using the water to clean streets in the Five Points area.

While the city's wealthier Protestant classes generally blamed the cholera epidemics on supposed moral failures of the Irish-Catholicism, drinking, and poverty-some reform-minded citizens began to see crowded tenement housing as the root of the problem. The Association for Improving the Condition of the Poor, an organization founded in 1843, began campaigning to improve these conditions. Physician-reformers, including Dr. Elisha Harris and Dr. John Griscom, also called for landlords to erect healthy tenements with better ventilation and more space. But tenement conditions and the health of their residents only worsened during the decade. By 1863, the death rate in the tenement-filled Sixth Ward was triple that of the city overall, with infant mortality as a leading cause of death. By 1860, many more people were dying every year than were being born: In a population of over 814,000, there were almost twice as many deaths (22,710)as births (12,454).

## **1866-1885 The Birth of the New York City Department of Health**

OF HEALT

CITY OF NEW YORK

1870 Department of Health created, with four administrative bureaus

1870s Commissioner Chandler appoints first milk inspector, opens laboratory

#### 1884

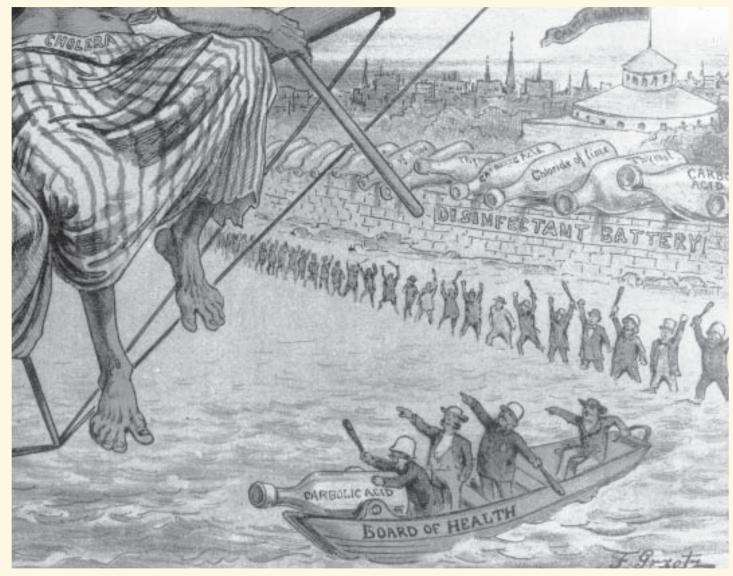
Department creates Division of Food Inspection and Offensive Trades In the late 1850s, reformers began calling for the state legislature to establish an independent city health department that would not be controlled by the corrupt Tammany machine. The first public health bill proposing such a department was introduced in

1859. The draft riots of 1863, in which Irish immigrants attacked black residents and more than 1,000 people died, caused many wealthy citizens to sign on to the reformers' cause, as they saw that tenement conditions could produce mass violence. A new group, the Citizens' Association, drew together prominent residents including Peter Cooper and Hamilton Fish, and physician-reformers such as John Griscom, Elisha Harris, Willard Parker, Stephen Smith, and James Wood. But it would take six failed health bills and the threat of a new cholera epidemic before the Association's efforts succeeded. On February 26, 1866, amid reports

that cholera was again headed to New York, the state legislature passed a new public health law that created the Metropolitan Board of Health. The new Board encompassed Kings, Richmond, Westchester, part of Queens, and New York counties. Under the law, the Board included a president, four police commissioners, a health officer, and four other commissioners appointed by the Governor. Importantly, at least three of these commissioners had to be physicians. Health in the city no longer lay under the sole control of politicians.

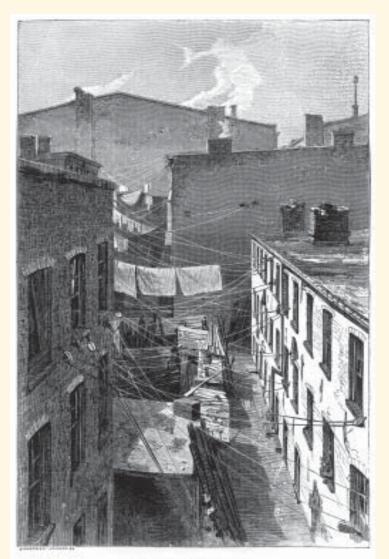
The new Board, led by the energetic Jackson Schultz, hired a phalanx of sanitary inspectors to curb cholera. When a case was reported, a crew was dispatched to disinfect the home of the victim and remove soiled garments. This corps of inspectors acted on new scientific evidence that cholera was transmitted through the excreta and bedclothes of

**B**oard of Health defending New York from Cholera. Cholera sits on the bow of the ship, in view of the Disinfectant Battery, from Leslie's Weekly, 1883.



{ Municipal Archives, New York City Department of Records and Information Services }

A perpetual fever-nest, New York City, circa 1860's. Engraved from a photograph by Anthony.



A PERPETUAL PRVER-NEST.

{ Municipal Archives, New York City Department of Records and Information Services }

the victims. The Board also sought to provide food and clothing for families of cholera victims. Partly due to these efforts, New York suffered a tenth the number of cholera deaths in 1866 that it had

in 1849. This triumph showed how the Board which under the new law had been rendered more powerful than any other local public



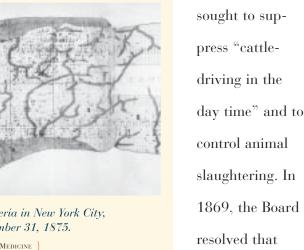
Map of Deaths from Diphtheria in New York City, May 1, 1874 to December 31, 1875. { National Library of Medicine }

health body in the United States—could stem the tide of epidemic disease.

Cleaning up the city proved a more difficult task. In 1866, the Board ordered 160,000 tons of manure removed from vacant lots, 4,000 yards to be cleaned, and 6,418 privies to be disinfected. The Board "coerced and stimulated the public schools and other institutional authorities of the district to regard sanitary laws," pressured landlords to clean up their

buildings, and

"neither hogs



nor goats could run at large in our city within its jurisdiction, neither could they be kept within 1,000 feet of any residence or business without a permit from the Board of Health." By 1870, the Board's brief honeymoon

seemed to be ending. "Boss" William Tweed,

"The Board of Health has gone to work in earnest, and has therefore undoubtedly discovered what a task it has undertaken. When we lay in our civic misery and filth, helpless and hopeless, and saw the cholera making ready to fall upon us, the news of the appointment of the Board was like a voice of succor."

Harper's Weekly April 28, 1866 Boss' William Tweed ... provided the city with a new charter. He created a new Health Department.

head of Tammany Hall, provided the city with a new charter, returning control over health matters to the city. He created a new Health Department with a Board of Health to oversee it. While similar in composition to the previous Metropolitan Board of Health, this Board included members appointed by the Mayor rather than the Governor. The Department was organized into four bureaus: a Bureau of Sanitary Inspection, a Bureau of Records and Inspection, a Bureau of Street Cleaning, and a Bureau of Sanitary Permits. Even when the Department and Board were headed by corrupt Tammany

hall appointees, the physicians and other

experts in these divisions created a buttress against political influence.



Charles F. Chandler, a professor of chemistry at Columbia University, exemplified the new scientific character of the Health Department. Beginning in the late 1860s, he directed a Department chemical laboratory that examined water, milk, and food supplies. Chandler, who was named Health Commissioner in 1873, worked for more than a decade to sanitize the city

within the constraints of an inadequate budget. He appointed the city's first milk inspector, but had a staff of only 14 health inspectors, sharply limiting the Department's impact.

## 1886-1914 Immigration, the Bacteriological Revolution, and Hermann Biggs

OF HEALT

CITY OF NEW YORK

#### 1892

Department opens Bacteriological Laboratory, first municipal laboratory in the world to routinely diagnose disease

1895 Department begins offering diphtheria antitoxin free of charge to poor

#### 1900

810,000 vaccinated in smallpox vaccination campaign

#### 1901

Department workers drain areas in outer boroughs to fight malaria

#### 1904

Department opens tuberculosis clinics; municipal sanitorium opened in 1906

#### **1906** Department begins inspection of dairies

#### 1907

"Typhoid Mary" is traced, confined at North Brother Island

n the 1890s, the new science of bacteriology provided the Department of Health with a potent arsenal of tools to combat disease among the increasing number of new Southern and Eastern *European immigrants.* This era began with German scientist Robert Koch's discoveries of the microorganisms that caused anthrax, tuberculosis, and cholera. But it was not until 1887, when Hermann Biggs and T. Mitchell Prudden

found the cholera vibrio in

samples provided by passengers on a ship in New York Harbor, that these discoveries were used to protect public health in the United States. In 1892, the Department opened a bacteriological laboratory, headed by Biggs, which would become the first municipal laboratory



Dr. Hermann M. Biggs, first Director of the Department's Bacteriological Laboratory, appointed 1892.

Public Health Laboratory, New York City Department of Health } and Mental Hygiene

in the world to routinely diagnose disease. That year, it would use these diagnostic tools to detect cholera on a ship of immigrants, enabling the city

> to take quick action to prevent another cholera epidemic.

The next year, a ship of Russian Jewish immigrants arrived in New York with epidemic typhus on board. The Department built quarantine pavilions on North Brother Island for the passengers. Four Department employees died carrying out their quarantine

duties, but typhus did not spread into the general population. This thwarted epidemic, however, marked an era in which the new immigrants were sometimes stigmatized as potential threats to the health of the city and the country, just as the Irish had been vilified in earlier decades.

-{18}

The Department's Little Mothers' League trained older children to care for younger siblings while their mother was at work. Photo, no date.



{ MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

"Public health is purchasable. Within natural limitations, a community can determine its own death rate."

Hermann Biggs, 1913

A different kind of Atlantic crossing brought knowledge of disease treatments to New York. In the summer of 1894, Biggs traveled to Europe to investigate the new diphtheria antitoxin that Emil von Behring, one of Koch's disciples, had developed. Upon verifying that this antitoxin worked, Biggs immediately sent a telegram telling Dr. William Hallock Park at the Department's laboratory to begin preparing the antitoxin by inoculating horses. A local newspaper raised funds sufficient to make enough antitoxin for Willard Parker Hospital, where contagious diseases were treated, as well as for private physicians. This action marked the first time the Department combated an epidemic by making an effective therapy available free to the poor. By 1906, the Department had 318 diphtheria antitoxin stations in all five boroughs, and was distributing over \$104,000 in free antitoxin per year. As a result, the city's diphtheria deaths, which had totaled

2,870 in 1894, would be halved by 1900, and would decline steadily thereafter.

In 1900, tuberculosis remained the leading cause of death among adults in New York City. In 1897, Biggs prevailed upon the Board of Health to pass an ordinance to require that physicians report all cases of TB to the city. While Biggs possessed "unsurpassed persuasiveness and skill in the presentation of his arguments to the authorities in power," in the words of Johns Hopkins physician William Welch, physicians resisted his call for mandatory TB reporting as an intrusion on their autonomy. Biggs addressed concerns about patient confidentiality: "Notification to sanitary authorities does not involve notification to the city at large." As the disease disproportionately affected the working class, the issue of reporting cases from private physicians' patients proved surmountable. Under Biggs, the Department sent medical inspectors to

the homes of patients to instruct families on how not to contract or spread the disease, offered free sputum examinations at the city laboratory, and conducted public education on the communica-ADVICE TO THE PERLIC ON THE USE OF MILK bility of the disease. In 1904, the Department opened clinics in which nurses provided nutritional support and taught patients how to get well or "at least how to live with the disease and, at the same time, not to communicate it to others" by coughing into Department of Health document, 1912. handkerchiefs and disposing of them. In January 1906, the Department opened a municipal tuberculosis sanitarium on North Brother Island, which

it moved a few years later to Otisville, in Orange County, NY. These efforts, along with improved social and economic conditions, cut the city's death rate from tuberculosis in half between 1900 and 1920.

Under Commissioner Ernst Lederle,

CONTRACT OF DEALER OF THE CASE OF 100 1048

so the pairs and in which we

old it. sells such he need he

PUBLIC HEALTH LABORATORY, New York City Department of Health

AND MENTAL HYGIENE

appointed in 1901, the Department stepped up laboratory inspections of water, food, and milk. In 1906, milk inspectors began visits not only to milk stores, but also to the 5,000 dairy farms that supplied the city. They checked the ventilation of stables, cleanliness of cow yards, health of cows and their milkers, and the cleanliness of milk pails. In the first year, the inspectors reported making 22,500 inspec-

tions of dairy farms and 861 inspections of creameries and shipping stations. Additionally, the Department began to inspect the cleanliness of public baths and even barbershops.

"During the eleven months ending November 30, [1903] 274 arrests were made for selling adulterated milk, and fines to the amount of \$2,465 were imposed. The courts have co-operated heartily with the Department, with convictions almost invariably obtained in milk cases. One persistent offender was sent to jail for thirty days, without the option of paying a fine."

Annual Report of the New York City Department of Health. 1903.

Mary Mallon ("Typhoid Mary") was quarantined for three years in Riverside Hospital on North Brother Island because she was a typhoid carrier and refused to give up her occupation as a cook. This letter from 1910 is her official release from confinement. However, she was later linked to a deadly typhoid outbreak and was sent back to North Brother Island, where she remained until her death. irnat 3. Kebrule, Str.S.

CEIVED FEB 23 1910 The set is constant of the letter of MAYON Set of Senting to the set of the letter of MAYON Set of Senting to the set of the letter of MAYON Set of Senting to the set of the letter of Typhold Hary."

New York, February 16, 1910.

To His Honor

The Mayor of the City of New York.

I wish to inform you that I have made a therough investigation of the above case, and find that Mary Hallon has been confined in a hospital of this department for three years on the ground that she is a typhoid carrier, and a danger to the community.

On February 11, 1910, at my request, the Board of

Realth passed the following resolutions

RESOLVED, That the President of this Board be and is hereby sutherized to release one Mary Mallon, a typhoid carrier, who has been detained at the Riverside Hospital, located at Morth Brother Jaland in the Berough of The Bronx, for the past several years, provided that said Mary Mallon is prepared to change her compation (that of cosk), and will give sampance by arridavit that the will upon her release take such hygicanic presentions as will protect those with when she come in comtact, from infection, and further that she will observe such other requirements as be may presoribe.

Pursuant to much resolution Mary Mallon signed

the following affidavit, and was thereupon released

by re.

MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES

The Department's most ambitious efforts in the early 1900s, however, would be its programs to reduce the city's astronomical rate of child mortality. The citywide baby care program, initiated by Dr. S. Josephine Baker in the summer of 1908, became the crown jewel of these programs. Dr. Baker, head of a new Division of Child Hygiene, assigned 83 nurses to visit mothers of newborn babies and instruct these mothers "as to the feeding, bathing, clothing, airing and general care of the infant." The nurses received from the Bureau of Vital Statistics lists of births recorded the prior day, and called upon the homes where these births had occurred. They checked to see if the baby was sick and to obtain information on the mother's care of the baby. The Division also sought to encourage mothers to breastfeed their babies. A circular distributed around the city read "Ten Bottle-fed Babies Die to One that is Breast Fed." For those

who would not breastfeed, the Department established milk depots in Manhattan and Brooklyn to distribute free, safe milk to mothers. In 1911, infant milk stations dispensed more than 538,000 quarts of milk, and by 1914, 55 such stations had been established. The Division also began a program to reach out to older girls who "are often forced to assume the care of babies' lives." In 1909 and 1910 the Department founded 71 clubs called "Little Mothers' Leagues" to teach girls to care for and feed babies.

School nurses' and physicians' inspection of children also reduced mortality from childhood diseases. In 1897, the Department began sending doctors to schools to inspect children for major epidemic diseases such as smallpox, diphtheria, whooping cough, and measles. In 1902, the Department began a school nurse program. Nurses, who were paid \$75 per month, visited "Marguerite, go wash your feet...

The Board of Health's across the street."

Children's ditty, early 1900s.

Between 1908 and 1914, the rate of death for children under one year of age dropped more than 40 percent. schools to inspect children for minor diseases such as head lice. The nurses gave children circulars printed in their native language on how to treat these conditions at home, and in some cases visited the children's homes to instruct their mothers on how to treat the cases. By 1908, the corps of school nurses was making more than 3 million such inspections of children per year.

Under Baker's dynamic leadership, the Division of Child Hygiene rapidly expanded, employing 697 people by 1914. Its programs also soon began to show results. Between 1908 and 1914, the rate of death for children under one year of age dropped more than 40 percent, from 167.7 per 1,000 population (10,493 deaths) to 99 per 1,000 (7,929 deaths). This drastic reduction in infant mortality continued into the 1920s and 1930s.

In 1907 and again in 1915, Dr. Baker helped track down the most notorious infectious disease carrier of the century, "Typhoid Mary" Mallon. Working with Dr. George Soper to find the source of a typhoid outbreak, Baker located Mallon, a healthy carrier of typhoid who had infected 22 people through her cakes and puddings. Between 1907 and 1910, the city isolated Mallon against her will in a cottage on North Brother Island. She successfully petitioned for her release, agreeing in a signed affidavit to give up cooking. But then in 1915, a deadly typhoid outbreak at Sloane Maternity Hospital occurred, leading Drs. Soper and Baker to a cook named "Mrs. Brown," who turned out to be Mallon. The Department of Health sent Mallon back to the cottage on North Brother Island, where she remained until her death on November 11, 1938.

{24}

### **I914-I922 The Health Department Modernizes**

OF HEALTH

CITY OF NEW YORK

1915 Health Districts proposed; begins as pilot project on Lower East Side

#### 1915

Bureau of Public Health Education created; begins printing publications, producing films to disseminate health information

#### 1916

Department imposes quarantines and sets up clinics during polio epidemic

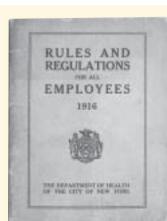
#### 1919

Commissioner Copeland sets up innovative drug treatment program Dr. Sigismund Goldwater's appointment as Health Commissioner in 1914 began an era of professionalization and modernization at the Department of Health. Dr. Goldwater reorganized existing bureaus

and mandated that all bureau chiefs become full-time public servants. He also organized a new Bureau of Public Health Education to disseminate health information through publications, lectures, and moving picture shows. To meet the needs of the expanding city,

Dr. Goldwater sought to create a system of Health Districts, establishing an experimental health center on Manhattan's Lower East Side. In 1915, Dr. Haven Emerson, Dr. Goldwater's successor, established additional District Health Centers in Queens and proposed extending the Health Districts to the entire city. This plan did not come to fruition until 1930.

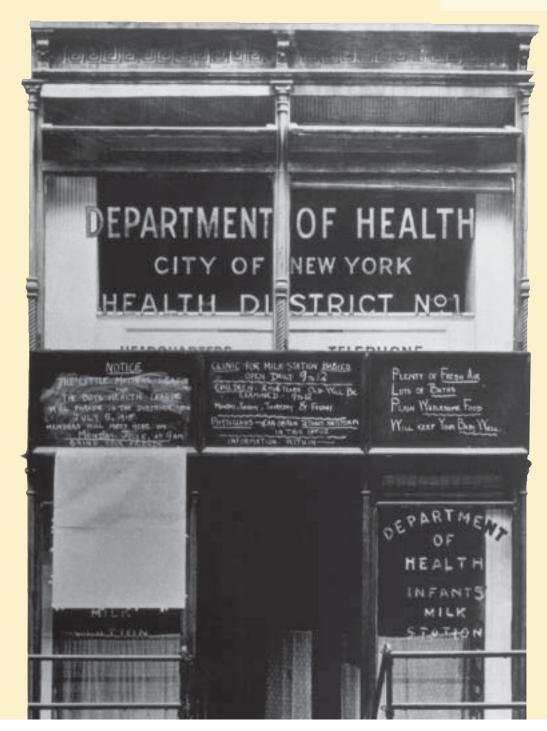
Between 1916 and 1919, the city experienced two major epidemics. Polio, which



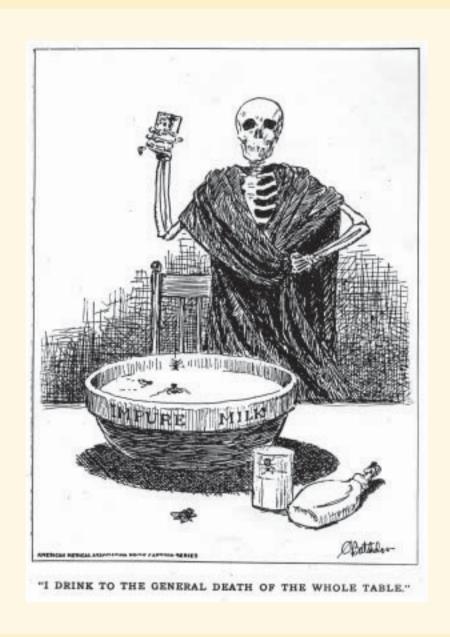
Department of Health document, 1916. PUBLIC HEALTH LABORATORY, { NEW YORK CITY DEPARTMENT OF HEALTH } AND MENTAL HYGIENE caused paralysis and death in children as well as adults, reached epidemic proportions in the summer of 1916. The Department isolated cases and quarantined those exposed, constructed emergency clinics, and ordered a delay in the opening of the public schools. But the Department's efforts were ham-

strung by ignorance of how the disease spread, and the epidemic, which involved 8,991 cases and 2,448 deaths in the city alone, would go down on record as the worst polio outbreak in New York history. Only two years later, the worldwide influenza pandemic hit New York,

#### **D**istrict Health Office, 1915



{ Municipal Archives, New York City Department } of Records and Information Services Illustration, American Medical Association Prize Cartoon Series, no date.



MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES

*Ver 95% of all drug* 

finding the Department's ranks thinned. Upon the entry of the United States into World War I, many doctors and nurses had left to join the Red Cross or the Army Medical Corps.

Commissioner Royal Copeland sought to maintain public morale during the epidemic by keeping schools open. As many as 12,000 New Yorkers died from influenzarelated causes, and critics pounced on



Tuberculosis patient on tenement rooftop, circa 1920. MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

Dr. Copeland for failing to mount an adequate response.

Dr. Copeland was not one to shrink from controversy. The first Health Commissioner to use the media as a publicity vehicle, he spoke out on a variety of conditions, from unsanitary tenements and unfair evictions to women's fashion. His most controversial move, though, was to open a service at Riverside Hospital in 1919

to treat people
with drug addiction,
including many
recently returned
World War I veterans.
The service included
a dispensary that distributed free narcotics
to get addicted people
into treatment. But
this experiment,

unprecedented at the time and radical even now, came to a swift end in April 1920. The controversy did little damage to Dr. Copeland's reputation. While serving as Health Commissioner, he ran for and won a seat in the U.S. Senate.

in 1919 shown, by the ople non-apprecia service, and l attempted to before the end or have in son fered with its while there." included New York City Health, 1920 a e narcotics

addicts treated at Riverside Hospital, from the beginning of service until now, have shown, by their acts, a non-appreciation for the service, and have repeatedly attempted to be discharged before the end of treatment, or have in some way interfered with its prosecution

New York City Department of Health, 1920 Annual Report.

Homes were quarantined because of diphtheria. Photo, no date.



{ MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

## **1923-1930 FIGHTING CORRUPTION AND EXPANDING HEALTH SERVICES IN THE ROARING 205**

 $\{1805 - 2005\}$ 

1926 Chest X-rays begin at TB clinics

**1928** Bureau of Nursing created

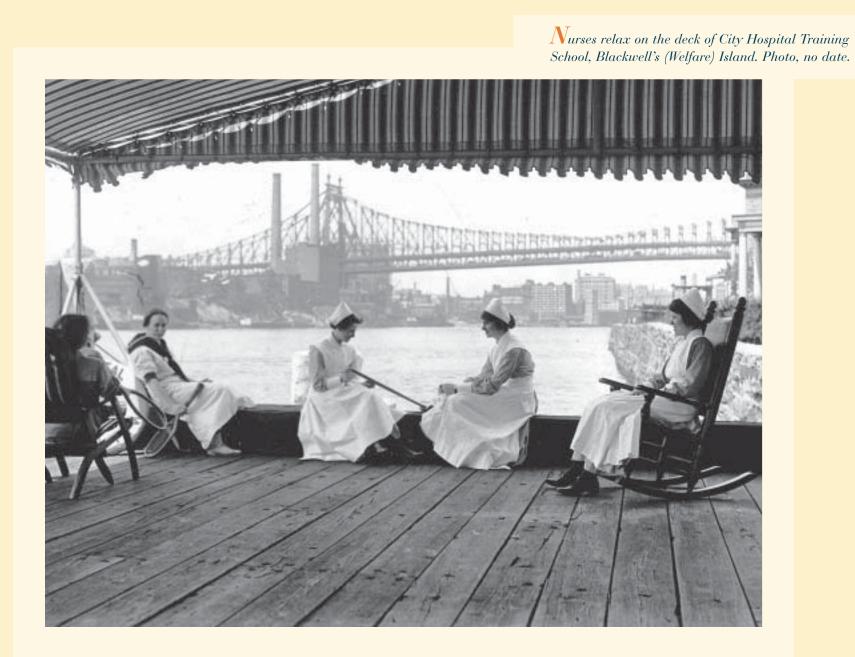
1930 First District Health Center opens in Harlem under new Health District plan

L he 1920s brought additional modernization to the Department. Dr. Louis Harris succeeded Dr. Frank Monaghan and put an end to problems of graft and corruption among the Department's milk and meat inspectors. He also revitalized the Department's tuberculosis clinics, which began offering chest X-rays for diagnosis. Additionally, a diphtheria vaccination campaign, begun experimentally in 1922, went into high gear in 1929 under the leadership of the next Commissioner, Dr. Shirley Wynne. This campaign, organized in conjunction with the Milbank Memorial Fund and the Metropolitan Life Insurance Company, was the first to harness the power of the media to deliver its message to the city's residents. The Diphtheria Prevention Commission posted information about the immunizations on streetcar and subway posters, on the radio, in lectures, and even in films shown at 500 movie theaters.

The Commission set up diphtheria immunization stations at parks, beaches, and public school buildings. The campaign would result in diphtheria immunizations of more than 522,000 children between 1929 and 1931.

Commissioner Wynne also garnered notice for ordering surprise milk inspection raids. Just before 2 a.m., the city's entire milk inspection force would gather at the city's train stations and approach arriving milk trains at railway terminals, as well as trucks leaving the terminals with milk. This way, the city inspectors could ensure true compliance with milk standards not just adherence when inspectors were expected to show up.

In 1929, a Committee on Neighborhood Health Development ushered in a fundamental change in the way the city approached public health when it convened to investigate the idea of neighborhood-based Health Centers. Based on



{ MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

[T] hese Health Districts would lead to a neighborhood-focused understanding of health problems in the city, and to health interventions tailored to different communities.

and the second se	<ul> <li>Arrest 1</li> </ul>	deres i
MANITARY CODE	Is provide verified with and such as not as factors. Note: 1 - 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2 -	<ul> <li>a. d. dis presions are plothes to taking an interaction of the presion in the source of the</li></ul>

New York City Board of Health Sanitary Code, 1925.

the success of a privately financed model health center located in the Bellevue-Yorkville area, the committee determined that these centers would "provide the key to the wide dissemination of public health work in New York City and the basis for a better coordinated, more inclusive and efficient public health program." The Committee divided the city's five boroughs into 30 Health Districts and proposed a neighborhood Health Center for each district. The

development of these Health Districts would lead to a neighborhood-focused understanding of health problems in the city, and to health interventions tailored to different communities. Additionally the clinics at District Health Centers, where residents could receive free care for a variety of conditions, provided what future Health Commissioner Dr. Leona Baumgartner would later call "the world's largest outpatient department."

### **1931–1940 THE DEPARTMENT, THE DEPRESSION, AND THE NEW DEAL**

OF HEALTH

CITY OF NEW YORK

 $\{1805 - 2005\}$ 

1934 Bureau of Social Hygiene created to combat venereal diseases

1935 Health Department headquarters built at 125 Worth Street

1936 "Premature Centers" and ambulance service created for premature infants

he election of Mayor Fiorello LaGuardia in 1933 heralded a renewed commitment to public health, even amid budget cuts he was forced to make during MIR CHANGING HEALTH PROBLEMS the Depression. Dr. John DEATHS entagion larrbea uberculosis (lung) L. Rice, LaGuardia's naumania appointee as Health whoid EATHS, MOSTLY OLDER ADJACTS Heart. Commissioner, leveraged Diabetes. All Other Deaths federal funds and manpower available under New York City's the New Deal to expand spulation the Department's facilities and programs. Construction of a new building on 125 Worth Municipal Archives, New York City Department Street in Manhattan had already begun when Rice took office, and

the building, completed in 1935 at a cost of \$4.5 million, still serves as the home of the Department of Health and Mental Hygiene. Other capital improvements in the 1930s included the construction of a modern

Deaths, New York City, Then and Now

TOTAL

Pediatrics or Geriatrics?

Mortality in New York City between 1880 and 1940 declined

by 61%. Chart 1943.

OF RECORDS AND INFORMATION SERVICES.

Asino

1880

1940

laboratory and 14 District Health Center buildings. This construction program, undertaken with grants from the Public Works Administration, was at the time the largest health construction project ever undertaken by any U.S. city. Dr. Rice expanded the work of the District Health Centers and created two new bureaus, the **Bureau of Tuberculosis** 

and the Bureau of Social Hygiene. The Bureau of Tuberculosis aimed to control TB, sending workers out to neighborhoods to track cases

36

Under the New Deal, the Department was able to expand its facilities. 125 Worth Street was completed in 1935 and still serves as the home of the New York City Department of Health and Mental Hygiene.



CHARLES B. MEYERS, Architect

{ ILLUSTRIOUS CONTRIBUTORS TO PUBLIC HEALTH, 1936. NEW YORK CITY DEPARTMENT OF HEALTH AND MENTAL HYGIENE. }

"The health center has become the basis of our health program." Fiorello H. LaGuardia 1937

and their contacts and made efforts to diagnose and clinically supervise those who could not afford private medical care. The

Bureau also performed fluoroscopic X-rays, conducted lab tests and research, and provided health education. As of 1937, the Department's TB roster contained



\$STD\$ Specimen Storage\$ { Public Health Laboratory, New York City Department of Health and Mental Hygiene }

19,000 actively supervised cases. The Bureau of Social Hygiene, which addressed venereal disease, organized an anti-syphilis campaign in 1934. The campaign extended to prevention and treatment of gonorrhea, and included case finding, diagnosis, free treatment at 12 clinics, and tracing and examining of sexual contacts.

> used lectures, films, posters, and pamphlets to educate the public about venereal disease—a progressive step in an era when these subjects could often not be

The Bureau also

discussed in polite company. At the 1939 New York World's Fair, the Health Department displayed exhibits about these diseases in addition to information about tuberculosis, pneumonia, child health, and other issues.

# I941-I949THE DOH IN THE WAR YEARS

OF HEALTH

EPARTMENT

CITY OF NEW YORK



1942

Bureau of Records microfilms all birth and death records in case New York City is attacked in World War II

1946

Food Inspection Bureau cracks down on poor restaurant sanitation

#### 1947

6.3 million New Yorkers vaccinated against smallpox in a single month

**1949** Department establishes Bureau of Nutrition

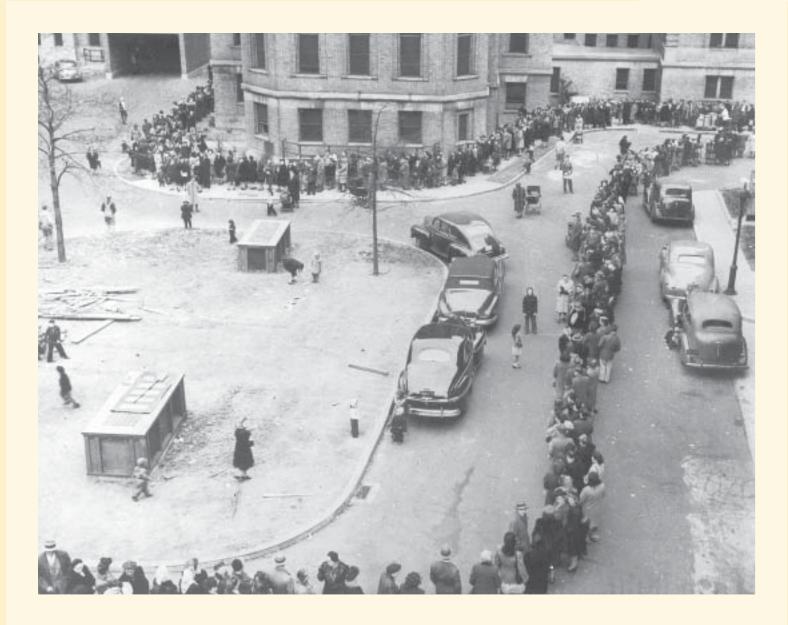
orld War II led to a mass mobilization of Department physicians and nurses to aid in the war effort, and the Department, led by Dr. Ernest Lyman Stebbins, had to keep its services operating with a skeleton staff. Commitment to public service ran high during the war, and 1,500 volunteers filled the vacant positions. The Bureau of Records produced thousands of birth certificates for job applicants in war industries, who were required to show proof of citizenship. The Bureau also microfilmed birth and death records to be able to store them in vaults at a remote location in case New York City was attacked. All Department personnel were required to have a gas mask at their desks in case of a biological or chemical attack, and health inspectors were trained in poison gas detection.

The Bureau of Child Hygiene also adapted to wartime. The director, Dr. Leona Baumgartner, convened a task force to investigate the quality of services provided by day care agencies that had opened to meet the needs of women in war jobs. The unit discovered that only half of the agencies provided adequate services, and sought to enforce improvements. Between 1943 and 1947, Dr. Baumgartner also operated a health care program to provide prenatal and infant care to pregnant women whose husbands were serving in the armed forces. This program became the model for the federal government's National Emergency Maternal and Infant Care Program. In New York, 53,000 infants and mothers were served by the program.

During the war, even the Health Department's nascent efforts in nutrition education sounded a patriotic note. In 1942, the Department published a ten-page nutrition pamphlet, "Food Joins the Colors," to emphasize the benefits of good nutrition for good citizenship. The next year, Gertrude Gates Mudge, appointed

-{40}





{ MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

*E*ducational exhibit on sexually transmitted (venereal) diseases. Circa 1940s.



{ MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

supervisor of nutrition, disseminated nutrition information at the District Health Centers. This program was the forerunner of the Bureau of Nutrition, established in 1949.

The Department's main logistical challenge during this period came after the war. when Eugene Le Bar, a merchant traveling back to New York City from Mexico, died of smallpox at Willard

**B**ird's eye view of people getting smallpox vaccination at 125 Worth Street, 1947.

Parker Hospital on March 10, 1947. Upon learning of Le Bar's death, Commissioner Israel Weinstein began planning to vaccinate the entire city to prevent an epidemic. The Department organized a corps of employees, 1,100 outside physicians, 242 clerks, and 3,000 civilian volunteers to vaccinate city residents. Police were

assigned to supervise the snaking lines of people waiting to be vaccinated at clinics around the city. Health Department staff immediately visited the apartment buildings where initial smallpox



MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES

the ring vaccination approach used in the global smallpox eradication campaign of the 1970s. Faced with a shortage of vaccine, Mayor William O'Dwyer held a late-night meeting of pharmaceutical representatives and virtually locked them in City Hall until they agreed to provide the needed vaccines. The Mayor also

victims lived. vaccinating neighbors in a door-to-door campaign that may have been more effective in preventing an epidemic than the massive citywide campaign. This effort foreshadowed

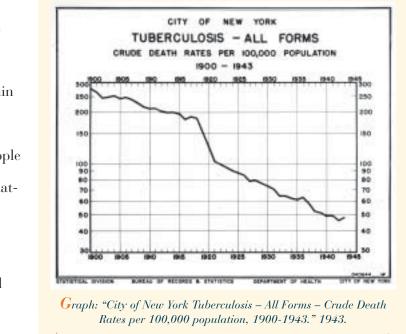
he time has come ... to urge everyone in the city to get vaccinated against smallpox. It is a virulent disease with a 40 percent *mortality rate among* children and 20 percent among adults. It is a big job but it should be done."

New York City Mayor William O'Dwyer April 12, 1947

Upon learning of [Eugene] Le Bar's death, Commissioner Israel Weinstein began planning to vaccinate the entire city to prevent an epidemic...the largest rapid vaccination campaign the world had ever seen.

called on the Secretary of War to mobilize the Army, Navy, and U.S. Public Health Service to provide vaccines to New York. By the end of the

epidemic, there had been twelve cases and two deaths, but within a single month, 6.35 million people had been vaccinated at a cost of \$461,000. The Department had executed the largest rapid vacci-



Rates per 100,000 population, 1900-1943." 1943.
[ Municipal Archives, New York City Department of Records and Information Services ]

and oxygen for premature infants. An ambulance service provided transport for premature newborns from home or a hospital to the center. To reduce maternal deaths, Department physicians concentrated

incubators, blood,

nation campaign the world had ever seen.

The 1940s saw another seemingly miraculous development in a marked drop of infant and maternal mortality. By the late 1930s, when premature birth had supplanted diarrheal their actions in districts where deaths remained high. Partially as a result of this work, the infant mortality rate dropped to its lowest rate ever in 1947, and maternal mortality was reduced by two thirds compared with the early 1930s.

disease as the leading cause of infant mortality,

the Department established "premature centers,"

staffed with trained nurses and equipped with

**{4**4}

## **1950-1969 FROM INFECTIOUS TO CHRONIC DISEASE**

OF HEALTH

CITY OF NEW YORK

1954 Salk polio vaccine tested in New York

1955 Department establishes Poison Control Center with hotline

1965 Department opens maternal care clinics with family planning services

1969 Department begins lead poisoning prevention program, which becomes a bureau

in 1970

In November 1954, Mayor Robert Wagner appointed Dr. Leona Baumgartner as the first female Health Commissioner in New York history: Through her dynamism, Baumgartner

ented staff and secured training and higher salaries to retain skilled personnel. When Dr. Jonas Salk announced he had developed a new vaccine for polio that year,

attracted a tal-



Mayor Wagner launches an aggressive polio vaccination program. Photo 1961. Municipal Archives, New York City Department of Records and Information Services

field trial. Tests having proven the vaccine effective, by 1955 Dr. Baumgartner made polio vaccination a regular part of the school health program and initiated aggressive polio vacci-

> among adults. By 1960, New York had become virtually polio-free. Widespread antibiotic use in the 1950s also drastically reduced cases of tuberculosis

nation campaigns

Dr. Baumgartner arranged for the vaccine to be tested in New York City, which suffered polio outbreaks nearly every summer. More than 40,000 New York City schoolchildren received the vaccine as part of a nationwide and made sexually transmitted diseases such as syphilis and gonorrhea treatable. As Dr. Baumgartner wrote later on, "Infectious diseases were largely under control. The limited goals of current public health needed



{ MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES }

A young woman receives a chest X-ray in an effort to control tuberculosis. Photo, no date.



{ Municipal Archives, New York City Department of Records and Information Services }

stretching." Chronic disease, including diabetes, heart disease, high blood pressure, and cancer, became the next frontier for public health. But before prevention campaigns could succeed, more needed to be known about these diseases. In 1958, the Department established a Health Research Council with a \$7 million budget to fund scientists to study chronic and infectious disease.

When Dr. Baumgartner left the Department in October 1962, her successor, Dr. George James, took up the cause of chronic disease prevention. He promoted Diabetes Detection Week, in which New Yorkers could arrange to get a diabetes test by calling a well-publicized number. He also campaigned to curb cigarette smoking, which was beginning to be recognized as a major cause of lung cancer and heart disease. James envisioned clinics to help smokers quit, along the lines of alcoholism rehabilitation clinics, and advocated for labels on cigarettes declaring they were hazardous to health. Although these ideas faced steep resistance in a society where almost half the population smoked, they represented a visionary attempt to reduce tobacco's health impact on society.

The Health Department's new concern with chronic disease under Commissioners



Daily News delivery truck with the Department's poster promoting rat control, 1960.

MUNICIPAL ARCHIVES, NEW YORK CITY DEPARTMENT OF RECORDS AND INFORMATION SERVICES Baumgartner and James did not mean it neglected continuing threats of infectious disease. After the measles vaccine became available in 1963, the "Infectious diseases were largely under control. The limited goals of current public health needed stretching."

Leona Baumgartner Health Commissioner Bulletin of the New York Academy of Medicine, June 1969 "There are 100,000 diabetics walking the streets of New York who do not know they have this disease."

George James Health Commissioner quoted in November 17, 1963 New York Times article publicizing Diabetes Detection Week Department administered it to the city's schoolchildren as part of the U.S. Public Health Service's nationwide measles vaccination campaign. Additionally, when Asian flu epidemics threatened, the Department encouraged the elderly and other vulnerable residents to get flu vaccinations. And though tuberculosis had been brought largely under control by the 1960s, James warned, presciently, of the rise in drugresistant cases. "We have to avoid the tendency to assume that because we have some successful drugs, the battle is over," James told participants at a 1963 tuberculosis conference.

In 1965, the Department secured \$1.4 million in federal funds to open five new maternal care clinics, which, for the first time in the city's history, were able to offer birth control services. But to avoid controversy and secure the participation of the city's Catholic hospitals, the program allowed the clinics at St. Vincent's and St. Catherine's hospitals to limit their family planning services to information on the rhythm method of contraception.

Mayor John Lindsay, elected in 1966, reorganized much of city government into "superagencies," bringing the Health Department, Department of Hospitals, the Community Mental Health Board, and the city Medical Examiner's Office under the aegis of a single Health Services Administration. He appointed Dr. Howard Brown to oversee both the Health Services Administration and to be James' successor as Health Commissioner. The Board of Health insisted, however, that one person could not do both jobs. The Mayor agreed and appointed Dr. Edward O'Rourke as Health Commissioner in February 1967. O'Rourke resigned in early 1969 and was succeeded by Dr. Mary McLaughlin, a Department veteran.

### **1970-1989** FROM FISCAL CRISIS TO THE AIDS EPIDEMIC

OF HEALTH

CITY OF NEW YORK

1976 Landlords required to install window guards in apartments with children; law reduces window fall deaths by more than 98 percent

#### **1981-83** Disease detectives

begin to track spread of AIDS epidemic

1983

Department creates Office of Gay and Lesbian Health

**1985** Department begins offering free anonymous AIDS tests

1988

Needle exchange program implemented to curb HIV among drug users

he headline of a May 1969 New York Times article, "Health Department Seeks Lost Glory," captured the spirit of the times. The article noted that fiscal cuts had forced the Department to curb services and that salaries of Department employees, from Commissioner McLaughlin to food inspectors, had not kept pace with those in the private sector, making it difficult for the Department to retain staff. But Dr. McLaughlin nevertheless sought to innovate within these constraints. In 1969, with \$150,000 borrowed from other areas of the Department's budget, she started a program to reduce lead poisoning in children. The Department estimated that 30.000 children in New York's poorer neighborhoods had elevated blood lead levels. This program would develop

into a Bureau of Lead Poisoning Prevention that would require any child admitted to a hospital from the city's "lead belt"—areas in which apartments commonly contained lead paint—to undergo blood lead level testing. Additionally, when inspectors found lead paint, landlords would be required to put wallboard over it.

McLaughlin seemed to flourish despite conditions of administrative and financial difficulty. During her tenure, the Department conducted a successful rubella vaccination campaign in 1969; developed regulations to ensure abortions were conducted safely after they became legal in 1970; investigated doctors for depriving Medicaid patients of services; and initiated a case-finding program for venereal diseases.

Under Commissioners Joseph Cimino (1972-74) and Lowell E. Bellin (1974-76), the Health Department worked to maintain core programs as city government slid into insolvency. Despite these fiscal constraints, Dr. Cimino maintained free immunization programs for polio, diphtheria, measles, and rubella at ninety

-[52]



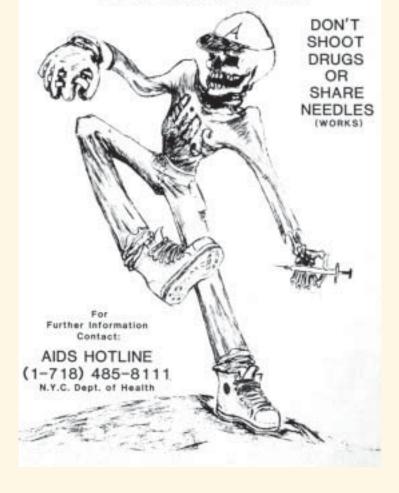


{ NATIONAL LIBRARY OF MEDICINE }

A IDS Hotline poster, early 1980s.

#### "HE CAN ONLY STRIKE YOU OUT IF YOU LET HIM!"

Don't Play With Your Life ...



{ NATIONAL LIBRARY OF MEDICINE }

child health centers around the city, and initiated a program to provide free venereal disease testing for women at the city's 13 maternal and infant care centers. New testing techniques developed in Department laboratories made gonorrhea testing for women possible on a large scale for the first time. Dr. Cimino also toughened restaurant inspections and initiated a required course in environmental sanitation for restaurant supervisors. When Dr. Bellin took office, the Department expanded school physicals to include tests for anemia, sickle cell anemia, and lead poisoning. He also played an active role in monitoring and improving care given under the Medicaid program. In 1974 and 1975, the Department recovered more than \$4 million from doctors who had padded Medicaid bills. In addition, following a period of restructuring and experimentation begun under Dr. Cimino, Commissioner Bellin re-professionalized the Department, bringing in high quality managers for key positions.

Dr. Bellin's efforts to draw experienced professionals to the Department occurred just as the city's fiscal crisis came to a head in 1975. As part of his plan to avoid municipal bankruptcy, Mayor Beame slashed the Department's budget by \$1.5 million. By November 1975, the Department announced it would have to close ten child health centers, eight eye clinics, a tropical medicine clinic, a venereal disease clinic, a chest clinic, three dental clinics, and two cardiac clinics. Even more concerning than the fiscal crisis, the Department faced widespread apathy about public health.

The Department countered this apathy during the 1970s by continuing immunization programs and beginning new initiatives such as a law in 1976 that required all apartment landlords to install window guards in apartments housing children under ten years old. This regThe Department countered this apathy during the 1970s by continuing immunization programs and introducing a law in 1976 that required all apartment landlords to install window guards in apartments housing children under ten years old. In June 1981, a nation that had relegated epidemics to history got a rude awakening when the first 41 cases of a rare cancer among gay men were reported by the Centers for Disease Control.

ulation has in the past three decades drastically reduced the number of children killed in window falls. Dr. Bellin's successor, Dr. Pascal J. Imperato (1977-78) maintained core services despite the ongoing fiscal crisis and continued annual immunization campaigns for schoolchildren. Under a federally funded program, he worked to close the gap between immunization status of preschoolers and school-age children. Commissioner Reinaldo Ferrer (1978-81) began rigorous inspections of sidewalk food vendors, expanded services for children at the remaining health clinics, kept venereal disease programs running, and oversaw aggressive neighborhood rat control campaigns as well as spraying campaigns to rid parks of mosquitoes. When an outbreak of Legionnaires' Disease led to 41 hospitalizations and three deaths in the summer of 1978, Dr. Ferrer led the Department's medical detectives in tracing the

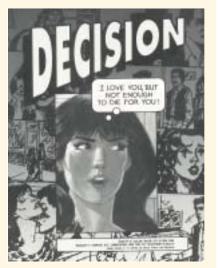
cause of the outbreak to an air conditioning tower over the midtown Macy's Department store, where they found the bacteria that causes the disease. Additionally, under Dr. Ferrer, the Department closed beaches in Queens when oil spills made them unsafe. He also investigated reports of typhoid fever in Brooklyn.

In June 1981, a nation that had relegated epidemics to history got a rude awakening when the first 41 cases of a rare cancer among gay men were reported by the Centers for Disease Control (CDC). The disease, soon known as Acquired Immune Deficiency Syndrome (AIDS), remained a puzzle to health officials. Under the new Commissioner David Sencer, a team of medical detectives from the Department and the CDC tried to crack the problem. The team's members interviewed AIDS patients, asking detailed questions about sexual practices and drug use that few people had been accustomed to asking or answering.

They also harnessed the power of computers to store and analyze data on cases they found.

By 1983, health officials had learned that the disease was generally spread through sexual contact or sharing of needles, and began efforts to educate the public. The Department also opened an

office of Gay and Lesbian Health. When a blood test for HIV became available, the Department began offering free tests to people in high-risk groups, including intravenous drug users and gay men. While the gay community had organized itself to deal with the AIDS crisis, IV drug users proved a more difficult group to reach. In October 1985, Dr. Sencer proposed that



The Decision cartoon novella ran in the New York City subways for ten years. The entire series is reprinted in a comic book version.

NEW YORK CITY DEPARTMENT OF HEALTH AND MENTAL HYGIENE

needles be sold over the counter to encourage IV drug users not to share contaminated needles. Even though this proposal met steep political opposition from some community leaders, Sencer's successor, Dr. Stephen Joseph, advocated a similar program, in which people addicted to drugs could exchange

used needles for free clean ones.

When Dr. Joseph became Health Commissioner in January 1986, he jumped full force into AIDS prevention and treatment efforts. Joseph fought to implement the needle exchange program, which became the only publicly financed program of its kind in the country. The program, when finally approved in 1988, "We are at the center of an epidemic in North America. It is a long, dark tunnel and we don't have any light at the end of it."

Health Commissioner Stephen Joseph New York Times January 17, 1987 In April 1988, a new law prohibited smoking in taxicabs and large retail stores and required large restaurants to create nonsmoking sections. limited needle exchange to addicts on waiting lists for methadone programs. Under Peggy Clarke, the Department's Assistant Commissioner for AIDS Program Services, the Department also

opened centers for anonymous HIV testing, produced AIDS awareness ads and videos, shuttered several gay theaters where high-risk sexual activity occurred, and distributed condoms at health fairs.

In the 1980s the Department also sought to reduce injury and chronic

disease. In 1986, a team of 12 inspectors spread out across the city to enforce the window guard legislation that had been on the books for a decade. In April 1988, the Department worked to help pass a new law that prohibited smoking in taxicabs and large retail stores and required large restaurants to create nonsmoking sections.

By 1987, AIDS services had cost the city

\$400 million, and with cases continuing to rise, a panel chaired by Joseph projected that costs would increase to \$1 billion by 1991. In May 1988, the city budget shrank due to an economic downturn, but the Department and AIDS activists successfully pressed for an increase in

AIDS program funding. AIDS programs would change in the 1990s as new drugs became available to treat the disease, but HIV prevention and services have remained a top priority of the Department.

Keith Haring's illustration was

symbolic of the Department's AIDS

Hotline for many years. New York City Department of Health and Mental Hygiene

# **1990-2005 New York's Public HEALTH RENAISSANCE**

OF HEALTH

CITY OF NEW YORK

1991 Program begun to improve asthma treatment for city's children

#### 1992-1996 TB control efforts drastically reduce cases in city

#### 1999

Department's disease detectives track West Nile virus

**200**I

Department responds to September 11 attacks

Department responds to anthrax attacks In early 1990, Mayor David Dinkins appointed Dr. Woodrow Myers as the city's first African-American Health Commissioner. Myers halted the controversial needle exchange program and called for increased treatment of

people addicted to drugs. When research began to show a rise in asthma deaths,



"I have asthma but asthma doesn't have me," campaign for The Childhood Asthma Initiative, 1998-1999. [1999 Campaign New York City Department of Health and Mental Hygiene]

disease under control. Between 1991 and 1994, the Department tripled the staff of the Bureau of Tuberculosis Control, led by Dr. Thomas R. Frieden, to 600 workers. The Bureau employed directly observed treatment, in which tuberculosis

> workers observe and help as patients take their medication, and pursuant to a

especially among African-American male children, the Department, under Myers, began a joint research project with Columbia University's College of Physicians and Surgeons to improve asthma treatment for minority children.

Between 1979 and 1992, tuberculosis in New York City had risen to alarming levels; many cases were highly drug-resistant. Dr. Margaret Hamburg, who was appointed Health Commissioner in 1992, led efforts to bring the health code change enacted by the Board of Health, detained non-adherent patients as a last resort when there were no other options for treatment. These TB control initiatives reduced multidrug resistant TB cases by 95 percent and overall TB cases by two thirds, and garnered global recognition as a model of successful TB control.

As the AIDS epidemic continued, Commissioner Hamburg secured a major increase in federal funding under the Ryan White Care Act,

In October 2001, letters containing anthrax were mailed to several media outlets in New York City. In all, there were 8 cases of anthrax in New York City, including one death.



### Nobody's stronger than New Yorkers.













In the terrible wake of 9/11, we said, "Things will never be the same". And they won't be, But as we go about our days, working, walking the dog, arguing about ball games, most of us are feeling something new - and good: a fresh appreciation for all the ordinary, normal, daily things that make a life. But while we are getting along with our lives, some of us may continue to feel sadness, anxiety and fear. If you have problems coping, be assured that you can always get help by calling 1-800-Lifenet.



1-800-LIFENET, or dial 311 and ask for Lifenet.



Michael R. Bloomberg, Mayor - Thomas R. Frieden, M.D., M.P.H., Commissioner

NEW YORK CITY DEPARTMENT OF HEALTH AND MENTAL HYGIENE

from \$44 million in 1993 to \$100 million in 1994. The continuation of this funding during the 1990s enabled the Department to provide patients with access to potent antiretroviral therapies, leading to a significant downward trend in the city's AIDS deaths.

Dr. Hamburg protected the agency's budget during a time of severe fiscal constraints. One way in which she did this was to emphasize that public health is integral to public safety. She initiated one of the

nation's first public health bioterrorism defense programs and oversaw the development of the first weapons-related injury surveillance system. With international outbreaks such as plague in India and ebola in Zaire occurring during her tenure, Dr. Hamburg was also an advocate for a strong public health infrastructure to contend with new and emerging infectious diseases. In 1998, Mayor Rudolph Guiliani appointed Dr. Neal L. Cohen to oversee the Department



The Department's epidemiologists collect mosquito larvae to gauge extent of West Nile virus infection, 1999.

{ New York City Department of Health and Mental Hygiene } of Health as well as the Department of Mental Health, Mental Retardation and Alcoholism Services, which he was already heading. The joint appointment signaled a plan to combine the two agencies. While these departments had been quasi-united under Mayor Lindsay's Health Services

Administration, this time they would be formally merged. "We believe a public health agency that is unified will be better able to address the complex needs of so many New Yorkers," Dr. Cohen said at the time. The merger, which became official in 2002 after approval by the city's voters in 2002 Merger creates Department of Health and Mental Hygiene

> **2003** Restaurants and bars become smoke-free

#### 2003 District Public Health Offices opened in Brooklyn, Harlem, and the Bronx

#### **2004** Take Care New York initiative to improve health and reduce health disparities

launched

*We must continue* to support tuberculosis control so we do not repeat the mistakes of the past."

Health Commissioner Margaret Hamburg New York Times, March 23, 1996 2001, resulted in the creation of the Department of Health and Mental Hygiene.

Amid the merger, Dr. Cohen's tenure as Commissioner would be punctuated by three unforeseen occurrences: the appearance of West Nile virus, the terrorist attacks of September 11, 2001, and the appearance of anthrax. In September 1999, an elderly Queens resident died mysteriously from an apparent mosquitoborne illness, believed at first to be St. Louis encephalitis. A team of investigators, led by Bureau of Communicable Disease Assistant Commissioner, Dr. Marci Layton, tested residents of the area to track the disease. Laboratory testing soon revealed the new illness to be West Nile virus, which had never before been seen in the Western Hemisphere. That summer, at least 62 people contracted the virus and seven died.

The terrorist attacks of September 11, 2001 created a public health emergency unique in New York City's history. The Department had to relocate its headquarters from 125 Worth Street, only a few blocks from the World Trade Center site, to the Bureau of Laboratories. Department officials remained on the job around the clock, working with federal officials to meet the demands of the emergency. Under these conditions, the Department of Vital Records continued to provide copies of birth and death certificates via internet, mail, and fax. Inspectors had to enter 200 closed restaurants in lower Manhattan to remove spoiled food, and exterminators baited the area to reduce the rat population. Working with the Department, the Office of the Chief Medical Examiner expedited death certificates to families of victims and tackled the monumental task of properly handling and identifying human remains recovered from the World Trade Center site.

By the time the nation's first anthrax case became public on October 4, the Department had

World Trade Center Health Registry campaign, 2003.



{ New York City Department of Health and Mental Hygiene }



{ New York City Department of Health and Mental Hygiene }

put in place a biowarfare agent surveillance system at the city's hospitals. The Department investigated eight cases of anthrax that subsequently appeared in New York, seven among employees of media organizations. In 2003 and 2004, the city's bioterrorism prevention efforts continued, with a voluntary smallpox vaccination campaign for the city's health care workers and tabletop bioterrorism preparedness exercises for the Mayor's staff. To track the long-term physical and mental health effects of those exposed to the fumes, dust, and debris released in the wake of the September 11 attack, the Department also inaugurated the World Trade Center Health Registry-the largest registry ever assembled to track the health of people exposed to a natural or man-made disaster.

Under Commissioner Thomas R. Frieden, who took office in January 2002, the Department began health surveys to monitor the health of each community and increased the Department's focus on programs that address chronic disease and health inequities. In July 2002, Mayor Bloomberg secured an increase in the city's cigarette tax to \$1.50 per pack, making cigarette prices in New York the highest in the nation. Following the passage of the Smoke-Free Air Act, which made virtually all workplaces, including the city's bars and restaurants, smokefree beginning in March 2003, and a smoking cessation and tobacco education campaign, 140,000 fewer New Yorkers were smoking within the year. In 2002, the Department conducted a comprehensive telephone health survey of New Yorkers in every neighborhood to provide neighborhood-level information on risk factors and health problems. The Department then used this data to craft a comprehensive policy initiative, Take Care New York, which identifies ten key areas for health interventions: primary health care; smoking cessation; cardiovascular

"We have strengthened our surveillance system to give us early warning signs of an illness or a cluster of illnesses that would suggest exposure to a bioterrorist agent."

Health Commissioner Neal Cohen October 10, 2001 A s New York enters its third century of organized public health, the need for continued vigilance to prevent and curb disease remains as clear as when the first yellow fever epidemic threatened the city:

health; HIV testing; treatment for depression; freedom from drug and alcohol dependence; cancer screening; immunizations; safe and healthy homes; and maternal and infant health. The initiative also

health status between lower income, black, and Hispanic New Yorkers and the overall population. Along these lines, in 2003 the Department launched three District Public Health Offices in areas of Brooklyn, the Bronx, and Harlem where health needs are greatest. Hearkening back to the

aims to reduce disparities in

tradition of the District Health Center, these offices seek to improve health on a communitylevel basis.

As New York enters its third century of organized public health, the need for continued vigilance to prevent and control disease remains as clear as when the first Yellow Fever epidemic threatened the city. AIDS deaths have fallen substantially, new cases of childhood lead poisoning have dropped 80 percent in the past eight years; and tuberculosis rates are 70



"If only the signs were that easy to read," 2002. The campaign is aimed at parents to recognize the signs of emotional problems in adolescents. [ New York City Department of Health and Mertal Hydene

percent below their high of the early 1990s. However, in 2005, approximately 18,000 New Yorkers disproportionately those in lower income and African-American communities—will die before they reach their 65th birthday, approximately half from preventable causes such as heart disease, HIV, and cancer. The Department's

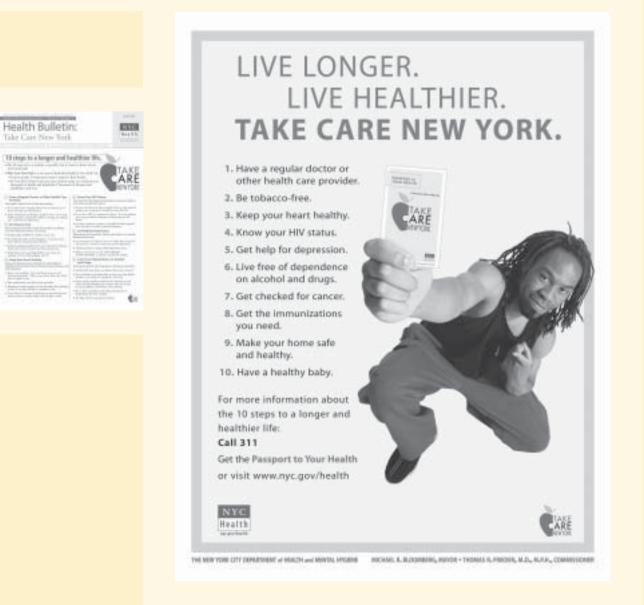
6,000 employees continue efforts to prevent disease and injuries and to improve the health of all New Yorkers. While challenges remain, the Department, building on a 200-year tradition of leadership, remains ready to meet the public health and mental hygiene needs of all New Yorkers.

*Everybody Loves a Quitter" Smoking Cessation campaign, 2004-2005.* 



{ New York City Department of Health and Mental Hygiene }

### Take Care New York is a city-wide health initiative launched in March 2004.



The Department conducted a comprehensive telephone health survey to provide neighborhood level information on risk factors and health problems and used this data to create a comprehensive policy initiative, Take Care New York, which identifies ten key areas for health intervention.

NEW YORK CITY DEPARTMENT OF HEALTH AND MENTAL HYGIENE

#### BIBLIOGRAPHY

Baumgartner, Leona, "One Hundred Years of Health: New York City, 1866-1966," *Bulletin of the New York Academy of Medicine*, Vol. 45, No. 6, June 1969, pp. 555 -586.

Board of Health, *Documents Relating* to the Board of Health, New York, Printed by James Cheetham, 1806.

City Health Information, *Take Care New York: 10 Steps to a Longer and Healthier Life*, New York City Department of Health and Mental Hygiene, June 2004, Vol 23(3) 11-18.

City Inspector's Office, Annual Report of the City Inspector' Office, New York, 1851; 1852; 1854; 1855.

City Inspector's Office, Annual Report of the City Inspector of the City of New York, New York, McSpeden & Baker printer, 1856.

City Inspector's Office, Report of the City Inspector of the City of New York for the Year Ending December 31, 1860, New York, Edmund Jones & Co, Printers to the Corporation, 1861.

Committee on Neighborhood Health Development, *Proposed Health Districts, New York City*, Department of Health, New York City, March, 1930. Duffy, John, A History of Public
Health in New York City, New York,
Russell Sage Foundation, 1968-[74]
Vol. 1, 1625-1866; Vol. 2 1866-1966.

Frieden, Thomas, Lerner, Barron, and Rutherford, Brett, "Lessons from the 1800s: Tuberculosis Control in the New Millennium," *The Lancet*, Vol. 355, March 25, 2000, pp. 1088-1092.

Hardie, James, An Account of the Yellow Fever, Which Occurred in the City of New-York, in The Year 1822 : To Which Is Prefixed A Brief Sketch of The Different Pestilential Diseases, With Which This City Was Afflicted, in the Years 1798, 1799, 1803 & 1805, New York, Printed by Samuel Marks, 1822.

Harper's Weekly, April 28, 1866 ("The Augean Stable")

Harrington, Virginia Draper, "Yellow fever in the United States from 1790 to 1830," or "The Great American Pestilence," Unpublished Master's Thesis, Columbia University, 1925.

Harris, Elisha, "Appendix II. Health of The City," in Osgood, Rev. Samuel, D, D., A Discourse Delivered Before the New York Historical Society on its Sixty-Second Anniversary, November 20, 1866, New York, John F. Trow, 1868.

Kelby, Robert Hendre, *The New York Historical Society* 1804-1904, New York, Published for the Society, 1904. Klepp, Susan E., "How many Precious Souls are Fled? The Magnitude of the 1793 Yellow Fever Epidemic," in J. Worth Estes and Billy G. Smith, eds., A Melancholy Scene of Devastation: The Public Response to the 1793 Philadelphia Yellow Fever Epidemic, Philadelphia, College of Physicians of Philadelphia, 1997.

Leavitt, Judith Walzer, "Be Safe. Be Sure.' New York City's Experience with Epidemic Smallpox," in Rosner, David, ed., *Hives of Sickness; Public Health and Epidemics in New York City*, New Brunswick, New Jersey, Rutgers University Press, 1995.

Leavitt, Judith Walzer, *Typhoid Mary: Captive to the Public's Health*, Boston, Beacon Press, 1996.

Markel, Howard, *Quarantine: East European Jewish Immigrants and the New York City Epidemics of 1892*, Baltimore, Md., Johns Hopkins University Press, 1997.

New York Board of Health, A History of the Proceedings of the Board of Health, of the City of New York, in the Summer and Fall of 1822: Together with, An Account of the Rise and Progress of the Yellow Fever, Which Appeared During That Season, and the Several Documents in Relation to it, Which Were Laid Before the Board, New York: P.& H. van Pelt, Printers, 1823. New York Board of Health, Annual Report of the Board of Health of the Health Department of the City of New York, New York : New York Printing Co. 1878, 1888, 1901-06, 1908, 1909, 1910-11, 1911-12, 1913, 1914, 1915, 1916, 1917, 1918, 1919, 1920, 1921, 1922, 1931, 1937.

New York City Department of Health, Annual Report, *Reaching Communities 1866 to 2000*, New York, New York, 2000.

New York City Department of Health & Mental Hygiene, Bureau of Communications, Press Releases, 1999-2004.

New York Times articles, 1916, 1947-2002.

Rice, John L., Health for 7,500,000 People: Annual Report of the Department of Health, City of New York for 1937 and a Review of Developments from 1934-1938, New York, N.Y., Dept. of Health, City of New York, 1938.

Rosenberg, Charles, The Cholera Years: The United States in 1832, 1849, and 1866, Chicago and London, University of Chicago Press, 1962, 1987.

#### **ACKNOWLEDGEMENTS**

 $\sim$ 

The Department of Health and Mental Hygiene is grateful to Marian Moser Jones, the author of this publication.

Thanks also to James Colgrove and the faculty at the Center for History and Ethics at the Mailman School of Public Health, Columbia University – David Rosner, Amy Fairchild, Ronald Bayer and Gerald Oppenheimer

Our gratitude also extends to others who contributed to this project: Kristine Alpi, Peter Backman, Drew Blakeman, Eve Cagan, Mark Dion, Thomas Frieden, Lenora Gidlund, Wilfredo Lopez, Diane Richardson, Steven Schwartz, Arlene Shaner, Hershal Shevade, Daniel Sokolow, Sheryl Trager, Andrew Tucker and Chris Warren

Published by the Bureau of Communications, DOHMH, April 2005 Sandra Mullin, Associate Commissioner Jeffrey Escoffier, Director of Health Media and Marketing

> Designed by Mark Dion Printed by Vanguard Direct

#### **C**OMMISSIONERS

1870 – 1872 Joseph Bosworth

1873 – 1883 *Charles F. Chandler, Ph.D.* 

1883 – 1887 Alexander Shaler

1887 – 1889 James C. Bayles

1890 – 1897 *Charles G. Wilson* 

1898 Nathan Straus

1899 – 1900 Michael C. Murphy

1901 John B. Sexton

1902 – 1903 Ernst J. Lederle, Ph.D.

1904 – 1909 Thomas Darlington, MD 1910 – 1913 Ernst J. Lederle, Ph.D.

1914 – 1915 Sigismund S. Goldwater, MD

1915 – 1917 Haven Emerson, MD

1918 J. Lewis Amster, MD

1918 – 1923 Royal S. Copeland, MD

1923 – 1925 Frank J. Monaghan, MD

1926 – 1928 Louis I. Harris, ML

1928 – 1933 Shirley W. Wynne, MD

1934 – 1942 John L. Rice, MD

1942 – 1946 Ernest L. Stebbins, MD 1946 Edward M. Bernecker, MD

1946 – 1947 Israel Weinstein, MD

1947 – 1949 Harry S. Mustard, ML

1950 – 1953 John F. Mahoney, MD

1954 – 1962 Leona Baumgartner, MD

1962 – 1965 George James, MD

1966 – 1967 *Howard Brown, MD* 

1967 – 1969 Edward O'Rourke, MD

1969 – 1971 Mary C. McLaughlin, MD, MPH

1972 – 1974 Joseph A. Cimino, MD, MPH 1974 – 1976 Lowell E. Bellin, MD

1977 – 1978 Pascal James Imperato, MD, MPH, TM

1978 – 1981 Reinaldo A. Ferrer, MD, MPH

1981 – 1986 David J. Sencer, MD, MPH

1986 – 1989 Stephen C. Joseph, MD, MPH

1990 – 1991 Woodrow A. Myers, Jr, MD, MBA

1991 – 1997 Margaret A. Hamburg, MD

1998 – 2002 Neal L. Cohen, MD

2002 – Present Thomas R. Frieden, MD, MPH



THE NEW YORK CITY DEPARTMENT of HEALTH and MENTAL HYGIENE

nyc.gov/health