JOHN NOLEN AND THE NEW SYNTHESIS IN AMERICAN CITY PLANNING

Charles D. Warren

As the nineteenth century turned to the twentieth, civic leaders, businessmen, and intellectuals joined together in a complex effort to improve urban life in the United States. The Boston journalist Sylvester Baxter, writing in the *Century* magazine, called it the "Great Civic Awakening," and he enumerated the major participants in the movement he described. These included village beautifiers, housing reformers, and park advocates aiming to ameliorate the degrading effects of rapid growth and rampant industrialization in American towns and cities. They came together in local and mostly voluntary organizations to improve and beautify the physical environment, but many also worked to address the underlying social, economic, and political causes of the chaos and misery of impoverished neighborhoods and congested streets. These reformers relied on the work of journalists, experts, and emerging professionals to inspire and abet their efforts to cleanse and revive the American city. Baxter's title alludes to the hope for enlightenment and communal redemption that had characterized earlier American awakenings and captures the evangelical fervor of the movement. The new century's reformers were motivated by an urban darkness filled with nightmares of poverty, disease, and disorder, and they envisioned a new morning lighted with promise, energy, and more than a few dreams.[1]

In his first book, *Replanning Small Cities* (1912), John Nolen wrote:

> The form of this civic awakening that is most significant and promising is the recognition of the need of comprehensive planning and replanning, especially of the smaller cities, where so much is practicable. Town planning, let it be understood, is not a movement to make towns beautiful in a superficial sense. Its purposes are fundamental. It aims consciously to provide those facilities that are for the common good, that concern everybody. . . . It endeavors to establish the individuality of a city,—to catch its peculiar spirit, to preserve its distinctive flavor, to accent its particular physical situation.[2]

Both Nolen and Baxter spent much of their lives proselytizing for the new civic ideals, but Nolen did more than persuade and convert. His idea of reform was pragmatic, accommodating plans to realities without losing sight of sometimes elusive ideals. Nolen worked at a time of great technological advances and huge movements of population; as the United States shifted from a rural to an urban society and wave after wave of immigrants arrived, a complex social urgency unfolded. He concentrated on smaller cities where urban growth had not produced the intractable politics, the frightening, gargantuan scale, and the accompanying despair of their larger counterparts. Planning there could anticipate the future, not just ameliorate the present. Though many of Nolen's concrete achievements are fragmentary—we see them in a street corner, a village green, a parkway, or an urban district, often subsumed now by the growth that he foresaw—the land, the architecture, and in some ways the structure of our society record the impact of

his work on the complicated ongoing encounter between culture and nature.

Nolen's life and work encompassed both the physical and social reform of towns and cities—indeed, his productive activism personifies the myriad concerns of the Great Civic Awakening. Born in 1869, Nolen lived the first half of his life in Philadelphia, and from 1903 until his death in 1937 he lived in Cambridge, Massachusetts. While he was still an infant, the violence and political corruption that later goaded Americans to seek reform entered his life in an event that left him suddenly without a father. Yet soon thereafter the bleak prospect for his future was transformed by one of Philadelphia's remarkable charitable institutions, an exemplar of the voluntary civic culture of America prior to the Great Depression. As Nolen reached adulthood he was drawn to those giving direction to the broad movement for urban reform, and after a protracted and often self-directed education, he began to assume the leadership of efforts to improve American cities. As the profession of city planning emerged in the early twentieth century, Nolen was in the vanguard—in important ways he was its inventor—and he devoted his career not only to nearly four hundred planning projects (see Appendix) but to formulating the profession's collective goals and nurturing its institutional development.[3] He was always looking forward, and his adult life became something of a mission to redeem the besmirched promise of the City Upon a Hill.

New Towns for Old was published in 1927 at the high point of Nolen's career. It offers a glimpse of his mature work, and it should be seen in the context of the career that preceded it and its ten-year aftermath. The book chronicles some of his greatest efforts and those of others too; civic leaders, businessmen, land developers, architects, and engineers—who were Nolen's clients and collaborators—all

played a role in his achievements. Especially important are those who worked with Nolen, his associates Philip Foster, Justin Hartzog, and Hale Walker, whose names grace his firm's plans. But credit is due to many others whose names appear less prominently, or not at all. Among them is the great, neglected Sylvester Baxter, who played a significant part in the present volume.

CHILDHOOD AND EARLY EDUCATION

John Nolen was born on June 14, 1869, not far from Independence Hall in Philadelphia (Fig.1). The fast-growing city had, by then, outgrown the bounds of William Penn's original square grid plan, and also outgrown Independence Hall, which served as the seat of city government. It was

Figure 1. John Nolen. *Nolen Papers, Cornell University Library*.

the second most populous city in the United States, much larger in physical area than Boston or New York, and much less densely built than the island of Manhattan or the Shawmut peninsula. The unconstrained geography of Philadelphia, combined with its widespread system of building and loan societies, made home ownership more widely available there than in other cities.[4] Nolen's family lived in modest circumstances, north of the original city boundaries. His mother, Matilda Nolen, was the youngest child of Phillip and Margaret Thomas, who had arrived from Würtemberg in the 1830s. His father, John Christopher Nolen, whose origins are uncertain, ran a hotel and tavern at 733 Sansom Street; his name is listed in *Gopsill's City Directory* followed by the word "liquors." John C. Nolen was known as Shay, and in addition to his business he was evidently active in the era's rough-and-tumble party politics.

Looking back to the time when Nolen was born, Lincoln Steffens wrote: "Having passed through all the typical stages of corruption, Philadelphia reached the period of miscellaneous loot with a boss for chief thief, under James McManus and the Gas Ring."[5] The Gas Works was a key to the McManus Republican Party machine, which used its continuous revenue stream and peculiar lending provisions as a source of patronage and a bank for graft.[6] The fraudulence of the city's politics was widely recognized, and elections were often an occasion for violence. Efforts to reform the degraded democracy of Philadelphia met with entrenched resistance, as they did in other cities and in the federal and state governments as well. The Gas Works, an important battleground of governmental reform in Philadelphia, would later engage Nolen's attention as a student, but while he was still an infant, the city's ugly politics dramatically changed his life.

The historian Harry Silcox sets the scene: "Proclaiming their intention to clean up Philadelphia's political system, the Republicans, under [Attorney General] Colonel William B. Mann, enacted Philadelphia's Registry Act that took effect with the election of October 1870. Under the act . . . voters were required to register before the election."[7] But registration was controlled by the Republican majority, so it was used to insure Republican victories, not fair elections. (The 1870 election was the first where African Americans were enfranchised; the same year, in a remarkable example of democratic city planning, the voters chose between two locations for the new city hall.)

Anticipating the violence that might accompany African American enfranchisement, the federal government had dispatched troops, and Election Day proceeded without incident. Still, alert to the possibility of irregularities subsequent to the vote, Shay Nolen and other Democrats gathered the next day outside the courtroom where the election return judges met to read and certify the vote. When time came to hear the returns for the 26th ward, there was a controversy, and a motion was made to call William B. Mann to advise on the resolution of a legal question. One of the judges asked that they also summon Lewis Cassidy, leader of the Irish-Catholic faction of the Democratic Party, so that both sides of the question would be represented by counsel.

When Mann arrived and tried to enter the courtroom, he was challenged by a man in the crowd named John Ahern, who insisted that Mann wait for Cassidy. A scuffle ensued, and Mann gained entry to the courtroom. Shay Nolen slipped in behind him, and Ahern tried to get in too, but was caught in the closing door. The guards inside, armed with blackjacks, beat the trapped Ahern while the crowd outside struggled to free him by forcing the doors

open. Eventually they succeeded and flooded into the courtroom. Chaos ensued, and while newspaper reporters looked on, Nolen and a bloodied Ahern chased William Crawford, a Republican judge, and Mann into a corner of the jury box. Nolen picked up a spittoon and hurled it at Crawford, who ducked as it smashed to pieces against the wall. Crawford was armed with a pistol (perhaps illegally) and he stood his ground as Mann provided legal counsel, shouting, "Defend yourself! Shoot, shoot!" Crawford, a war veteran, coolly took aim at Nolen, who crouched down, but not low enough to avoid the bullet that entered his neck and lodged next to his spine.

Shay Nolen was taken to his home at 937 Buttonwood Street, where he lay for two days drifting in and out of consciousness. He was able to make a statement identifying Crawford as his assailant and Mann as an accessory. One paper reported that the renowned surgeon Samuel D. Gross was called in to consult, but apparently to no avail. Nolen died three days after he was shot, leaving his widow, Matilda, to raise two daughters and a one-year-old son, John Nolen.[8] Crawford was immediately arrested and charged with murder, though allowed to finish his work as an election return judge before he was imprisoned to await trial. He pled self-defense and was acquitted by a coroner's jury. Charges against Mann were dropped.[9]

The years that followed must have been difficult for Matilda Nolen. The economic depression that hit Philadelphia particularly hard in the winter of 1873–74 took a toll, and during this period the two Nolen girls died, leaving her alone to care for her only remaining child, John.[10] In 1878, when John was nine, she was remarried to Caleb F. Aaronson, and the young boy, evidently not welcome in his stepfather's home in Trenton, New Jersey, was admitted to an orphanage called Girard College.

Stephen Girard had left the bulk of his vast shipping and banking fortune to found Girard College, a nonsectarian boarding school for orphaned white boys. After some legal wrangling over the estate, the trustees proceeded with the construction of an enormously expensive Greek Revival campus designed by Thomas U. Walter, which was completed in 1848 (Fig. 2). The terms of Girard's bequest put control of the college in the hands of Philadelphia's elected officials, but irregularities led to the amendment of the charter, and in 1869 the Office of City Trusts, directed by twelve lifetime trustees (appointed by the city judiciary), was established to oversee the college and its endowment. Girard was prosperous and growing when Nolen entered in 1878. There were 871 boys who followed a curriculum that changed frequently, reflecting uncertainty about whether

Figure 2. The main building at Girard College, the school for orphans where Nolen lived and studied from 1878 until 1887. *Nolen Papers, Cornell University Library.*

impoverished orphans should be given a liberal education or one that would prepare them for a practical trade. Nolen excelled at Girard, finishing at the head of his class and staying on after his graduation at fifteen, in 1884, to study drawing. During that time he went to work as an office-boy for the president of Girard, Adam Fetterholf. Then, in 1887, he was "bound out" to his mother and went to work as a clerk for John Smiley, a wholesale grocer. But after a few unpleasant months, another place was found for him within the Girard fold.[11]

Nolen had impressed his teachers and ingratiated himself with the leaders of Girard, several of whom made special efforts to nurture the bright young man. George E. Kirkpatrick, a childless man who ran the Girard Trust, hired Nolen and trained him in the financial management of the endowment as he had been trained by his father, who preceded him in the job.[12] He became a friend and advised the young man as he helped ease his transition from ward to employee. (Curiously, during the entire time Nolen was associated with Girard College and the Girard Trust, William B. Mann, the person his father had identified as an accessory to his murder, served on its board of trustees.) After four years in the Girard Trust office, Nolen's ambitions exceeded its confines and he applied to the newly formed Wharton School of Finance and Economy at the University of Pennsylvania.

WHARTON, ONTEORA, AND THE WHITE CITY

Nolen entered Wharton just as German universities were beginning to have a major impact in the United States. Their open, public character, their willingness to grapple with current political and social problems, and

their innovative teaching methods provided a striking contrast to English models, which had long dominated American pedagogy.[13] Wharton was intended as an alternative to the University of Pennsylvania's classical curriculum, and it quickly joined Johns Hopkins as a major port of entry for German pedagogy and German ideas. As the school evolved under its first head, Albert Bolles, the curriculum focused broadly on administration and political economy. Subsequent additions to the faculty gave it a decidedly Germanic cast. In Edmund James, a new professor of public administration and finance, Bolles had found a German-educated scholar, writes Wharton historian Steven Sass, "with a commitment to reproduce in the United States the vaunted German system of generating civil servants and public policies." James, who would become Nolen's early mentor, "was true to the [German] *verein* idea and hoped to influence events as an academic, through research and command of the scholarly literature."[14]

The *verein* idea was derived from German associations that studied and developed policy initiatives, and in the process dissolved barriers between scholars, political activists, and government—something like a late-twentieth-century American think tank. This model of academic activism had crossed the Atlantic with the increasing number of German-trained American students, including James's Halle University classmate Simon Patten, who joined the Wharton faculty in 1885. Others, most notably Richard T. Ely and Herbert Baxter Adams, alumni of the same German universities, promoted similar methods and ideas at Johns Hopkins. Adams founded the American Historical Association, an offshoot of the American Social Science Association, and with James, Patten, and Ely he helped establish the American Economic Association (AEA). Through these organizations, publication of jour-

nals, and various connections with universities, the men sought to establish the *verein* idea in the United States.[15] Wharton was an important nexus of their activities, one of which was the establishment of the first American society for university extension teaching, where Nolen eventually began his career.

Along with the German pedagogy came an awareness of German communal traditions and advocacy of German-style socialism. The AEA, in its early days, worked to counter the prevailing laissez-faire economics, advocating state intervention in the "natural" workings of the economy. (Henry C. Carey and his circle in the Philadelphia Social Science Association had been thinking along similar lines, challenging laissez-faire orthodoxy by advocating protectionist tariffs as the lynchpin of nationalistic economic policy since the end of the Civil War.) German ideas and administrative methods provided useful models for those who were reacting to the corruption and inefficiency of American government and intent on reforming city, state, and national government. It was an example that led the AEA to assert the principle that all levels of American government should take responsibility for the social and economic well-being of its citizens.[16]

Invigorating German ideas and techniques were being grafted onto American traditions of journalistic and clerical activism when Nolen entered Wharton in autumn of 1891. The curriculum had evolved to encompass the last two years of a college education, and Nolen was able to qualify, by examination, for entry as a junior. It was a small school then (fifty-nine students in 1892), and under the sway of Patten, whose powerful, imaginative mind came to dominate the school, and the socially active Edmund James, Nolen was introduced to important new currents in social, economic, and political thought.

Patten's books and exploration of the consequences of a surplus economy had wide influence in the academic world, but James's activism directly engaged social and political issues; he plunged headlong into the political controversy surrounding the management of the Philadelphia Gas Works in the 1880s, which presented a perfect case study of the political ideas and administrative methods he was teaching at Wharton. His documentation of the negative consequences inflicted upon the people of Philadelphia by the corrupt administration of the Gas Works provided a stark contrast to the beneficial municipal ownership and efficient operation of similar utilities in Germany.[17]

In the spring of 1893, at the end of his two years at Wharton, Nolen's class produced a book of essays on municipal government in Philadelphia, each student taking a different aspect of the city as a subject for his essay. Nolen chose the Philadelphia Gas Works. He described the successful "good government" effort led by James, which put the Gas Works under direct city control, and he explained how it had slipped back into inefficient private operation after only a few years under the reformed regime. Nolen's essay not only provides a coda to his teacher's efforts, it reveals his awareness of the political machine his father had recklessly opposed. It was his first published work.[18]

During the three summers of 1892–94, Nolen was employed at Onteora Park, Candace Wheeler's summer colony in the Catskill Mountains. Wheeler had founded Onteora near her native Delhi just two years after New York State had established the 34,000-acre Catskill Park in 1885. She was a multifaceted designer and gardener who, after a short-lived but fruitful partnership with the artist and designer Louis Comfort Tiffany (they had collaborated on design work for the White House), had established Associated Artists, an all-woman enterprise devoted

to textile making and interior design. Nolen was employed as superintendent of the thousand-acre resort, where he was involved with all aspects of the care and feeding of the three hundred cottagers and guests from New York City, Philadelphia, and elsewhere. At Onteora he was exposed to the advanced artistic tastes of Wheeler, Albert Herter, J. Carrol Beckwith, and other authors, illustrators, and artists.[19] Far from the torrid city heat, 2,500 feet above sea level in the cool mountain air, there was a very different kind of society from that at Wharton, one preoccupied with nature, art and visual design, literature, domestic comfort, and beauty. It was during this period that Wheeler was involved in the World's Columbian Exposition in Chicago. (The interior decoration of the Women's Building there was under her supervision.) She rhapsodized about the fair: "The whole thing seems to have sprung into being fully conceived and perfectly planned . . . a vision and foretaste of how the world will one day build in earnest."[20]

At the end of his second summer at Onteora, Nolen visited the Columbian Exposition. The fair was *the* attraction of the summer of 1893, proving to be an epiphany for some and an inspiration for all who visited the streets and lagoons of the shimmering White City. Not since the Spanish conquest had destroyed the urban complex in the valley of Mexico had there been such a magnificent integration of land, water, and architecture on the American continent. Indeed, such coherent (if ephemeral) planning was impressive even to Europeans. Moreover, it was public art, not a secluded idyll for private enjoyment of a few but a demonstration of stylistically and spatially unified architecture and landscape design open to all. It was the embodiment of a new civic ideal. Nolen was apparently overcome with admiration and excitement; after visiting its diverse ex-

hibits he wrote of "a deep desire to do *something* in this great universe."[21]

EARLY CAREER, MARRIAGE, AND TRAVEL

Returning from his visit to the fair, Nolen began work as the assistant secretary of the American Society for the Extension of University Teaching (ASEUT), a position that had been offered to him by his Wharton professor Edmund James, who was president of the society. ASEUT was a realization of the *verein* idea described by Herbert Baxter Adams—an institution meant to broaden the availability of university-level instruction to include those who were unable to matriculate on a full-time basis. Nolen's work at ASEUT involved the administration of its lecture courses around Philadelphia, and it included travel, too, as he was sent out to help establish university extension programs in other cities and towns throughout Pennsylvania. He was able to further his own education by meeting the professors, overseeing the production of syllabi and reading lists, and often attending the lectures. He developed a wide acquaintance among the society's lecturers and participants, which included figures such as Woodrow Wilson and Samuel Gompers, and close, lifelong friendships with others, in particular the author Edward Griggs, who helped broaden Nolen's exposure to literature and art history. The diverse course offerings included philosophy, literature, history, art, science, and horticulture, and many of the courses focused on the reform of American civic life and municipal government. Paging through the monthly issues of the *Citizen*, the ASEUT magazine that Nolen edited, one finds articles on streets, water supply, transportation, and good government, all topics that became central to his later professional life.[22]

At the end of his first academic year at ASEUT, Nolen returned to Onteora for a final summer. From there he carried on a correspondence with Barbara Schatte, whom he had met in 1891. (His Girard friend Frank Zesinger had married Barbara's older sister, Emma, in 1892.) In a situation reminiscent of Nolen's own experience, Barbara and her sister had been orphaned in the 1870s and were consigned to the Episcopal Church Home for Children until they were eventually taken in by Mr. and Mrs. Effingham Perot, a well-to-do couple with no children of their own. The Perots kept a house in Philadelphia and in 1889 had built a country place in Ardmore called the Beeches. They became kindly parental figures for the close-knit sisters, unstintingly seeing to their education, chaperoning their courtships, and nurturing them well into adulthood. After finishing her education Barbara taught at James Forten Elementary Manual Training School, a public school for African American children in Philadelphia.[23]

In the fall of 1894 Nolen returned to his job at ASEUT with a 50-percent increase in salary—a strong vote of confidence given the difficult economy of the mid-1890s. The following year Edmund James resigned from ASEUT and went to the University of Chicago, where the extension university was more closely integrated with the regular curriculum. Nolen continued his work as assistant secretary until 1896, when the secretary, Edward T. Devine, left to become the general secretary of the Charity Organization of New York City. Nolen became acting secretary of ASEUT in 1897.

With the financial stability that accompanied his new position, Nolen married Barbara Schatte in spring of 1896. The event was attended by friends and family, including Nolen's mother who had returned to Philadelphia after the death of her second husband in 1894 and had reestablished

close ties with her only child. The newlyweds went off to Europe on a wedding trip that took them around England and to Paris, Brussels, and Cologne. Nolen had been to Europe once before, when he went to Oxford for the annual Extension University Summer School, but the wedding trip was his first opportunity for extended European travel.[24]

Before leaving, John and Barbara Nolen arranged for the construction of a new house in Ardmore, not far from the Perots. Years later Nolen would explain that he was able to travel to Europe and build his house because of his participation in one of Philadelphia's building and loan societies, an economic model he repeatedly advocated as a method of encouraging and enabling home ownership.[25] The house, which the couple called Blytheham, introduced Nolen to commuting and other novel aspects of suburban living, and perhaps inspired by Candace Wheeler's gardens at Onteora, Nolen made his first foray into gardening and landscape design. From 1897 until 1902 he planted, nurtured, and tended the one-third-acre property (Fig. 3).

Domestic comfort and his position at ASEUT did not forestall Nolen's restlessness. He was curious to see the German municipal system firsthand and eager to study in a German university. So after seven years of administrative work he took a year, from 1900 to 1901, to travel in Europe with his family and attend the University of Munich.[26] There he enrolled in classes in Renaissance cultural history, Italian painting, and German architecture and sculpture, taught by Arthur Weese, author of a book on the architecture and urbanism of Munich.

At the turn of the twentieth century German city planning and administration were far in advance of other countries, and Munich was at the forefront. The long tradition of municipal home rule and the Bismarck era's administrative and legal reforms combined with rapid urban growth

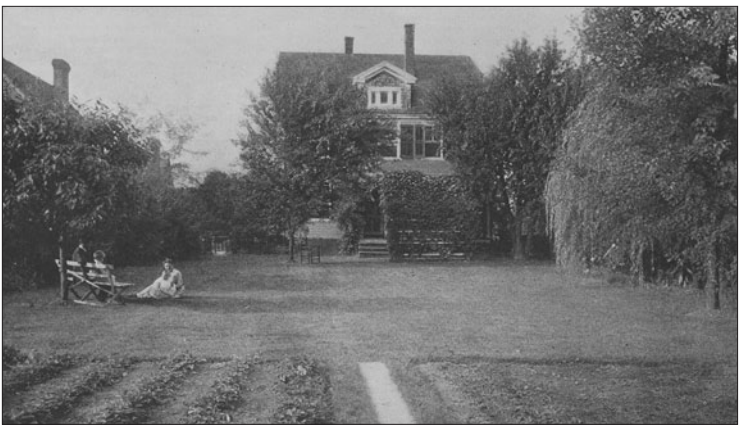


Figure 3. The garden at Blytheham, John and Barbara Nolen's first house in Ardmore, Pennsylvania. *Country Life in America, Aug. 1905.*

to spur the development of detailed modern city planning techniques, which included hygienic innovations, zoning, and novel land development techniques, as well as new artistic approaches to urban design.[27] These were known in the United States through *Municipal Government in Continental Europe*, by Albert Shaw (writer of the introduction to the present volume), through lectures such as one given by the German architect Josef Stübben at the Chicago Exposition, and by way of British interpreters such as Thomas C. Horsfal. Many other transatlantic connections provided a growing awareness of German design technique, which continued to develop and change in the last decades of the nineteenth century. Much of the change was owing to the Viennese architect Camillo Sitte's critique of contemporary Beaux-Arts technique and its influence on the planning of the Vienna Ringstrasse, which appeared in his 1889 book, *Der Städtebau.* Sitte advocated a more intimately scaled, picturesque, and topographically responsive method of ur-

ban composition, which emulated the balanced asymmetry of medieval urbanism and eschewed the grandiose axial compositions and rigidity that had characterized European city planning of the nineteenth century.[28]

In 1900 Munich was being transformed by rapid growth and by the results of an influential design competition held seven years before. Sitte was on the competition jury, and his ideas could be recognized in winning schemes by Karl Henrici and others. The new plans attempted the coherent integration of city extension plans at the urban periphery (by then a well-rehearsed German specialty) with sympathetic changes made to the historic center. Implementation was under the supervision of Theodor Fischer, who wrote of Sitte,

> He sharply chastised the intellectually desolate schematicism of the times and demand[ed] freedom and artistic treatment. Practical attempts in these directions were entered upon amidst violent opposition. Among them Henrici's project for the extension of Munich is the most valuable. This gave Munich the advantage of being the first to adopt the new point of view.[29]

Nolen, with his interest in art and civic affairs, must have attended carefully to the ongoing physical realization of these innovative planning ideas.

HARVARD AND BOSTON

That year abroad was a turning point in Nolen's life. Upon his return, he resolved to leave his ASEUT position and enter the new landscape architecture program at Har-

vard. ASEUT's ambitious journal, the *Citizen,* had ceased publication, and with Edmund James's departure the leadership in university extension education had passed to other institutions. Moreover, Nolen was eager to play an active role beyond the confines of an institution whose activities relied on private funding. His experience nurturing the garden in Ardmore, too, foreshadowed the career change, though he saw landscape architecture as more than garden design. Rather, it was a means of combining his "love to be outdoors," his desire for artistic expression, and a "large and constant opportunity for public good."[30]

Specialized programs and professional schools proliferated at Harvard during the presidency of Charles W. Eliot, and a program in landscape architecture led by his son Charles Eliot had been contemplated in the late 1890s. But the untimely death of the younger Eliot delayed the program's start until 1900. In his place Fredrick Law Olmsted Jr. took the lead; his classes and those taught by Arthur Asahel Shurtleff were at the core of the landscape curriculum. At first these classes were pieced together with offerings in the Bussey Institution (a precursor of the Arnold Arboretum) and the Lawrence Scientific School, which was home to the architecture department. But by the time Nolen arrived in 1903, J. S. Pray, who went on to develop Harvard's planning program, had joined the faculty, and in 1904 Henry Hubbard, Harvard's first graduate with a degree in landscape architecture (1901), was teaching there.[31] It was still a small operation with only eleven students, and Nolen was older, if only by a little, than each of his landscape architecture teachers.

Nolen was admitted as a regular student in the second-year undergraduate class, but not as a candidate for a degree; by January 1904 he applied to change his status to become a candidate for a Master of Arts degree. He was an

exemplary student, but he struggled with freehand drawing and he dropped a course in elementary architectural design. Otherwise he earned As and Bs in horticulture, forestry, landscape architecture, and a special advanced study course with Olmsted Jr.[32]

All of Nolen's Harvard landscape teachers were employed at one time or another in the Olmsted office, where Charles Eliot and then Olmsted Jr. had assumed leadership in the late 1890s as the old master's health declined. Their professional experience spilled over from office to classroom, and the pedagogy emerged from the practice. According to the historian Susan Klaus,

> Olmsted [Jr.]'s notes for the [landscape] course indicate that he began with an historical review of the gardens and landscapes of the ancient world and the Renaissance, then moved on to English landscape history and its influence in the American colonies. Fifteen lectures were allocated to contemporary landscape treatment of private estates in the United States and abroad; the first year of instruction culminated with fourteen lectures on streets, parks, and public spaces in Washington, New York, and Boston.[33]

All three of these cities had been transformed by the Olmsted office.

Olmsted Jr. may have been leading a course of study in landscape architecture, but he and his firm were at the forefront of planning practice in the United States, and the line between landscape architecture and city planning often was hard to discern. Olmsted Jr. had accompanied his father to planning meetings for the Chicago Exposition, and in 1901–2 he collaborated with D. H. Burnham and Charles McKim in the U.S. Senate Park Commission, which pro-

duced what is often referred to as the McMillan Plan for Washington, D.C. There Olmsted Jr. demonstrated the latitude in planning that could be entrusted to a landscape architect, integrating parks and natural features with far-reaching transportation improvements to create a city plan structured as much by the landscape as by the architecture.[34] The wide publicity given the McMillan Plan cannot have escaped Nolen's attention; surely he viewed his entrance in the new Harvard program as a viable route to professional training in the innovative approach to urban problems inherent in the comprehensiveness of the commission's Washington plan.

Olmsted Jr. was an important innovator, and Washington was a significant advance, but both were part of a complex process by which city planning ideas had emerged from the geography, politics, and personalities of Massachusetts at the end of the nineteenth century. Boston's remarkable municipal parks and parkways were the local result of this process, but the consequences of the ideas were more far-reaching. The metropolitan park system came to exemplify a distinctly American approach to city planning. The art historians George and Christiane Collins characterized it as "the design of city parks and green spaces on a large metropolitan scale for the reclamation of land, the insulation of residential areas, [and] recreational purposes." They went on to identify Olmsted Sr. and Sylvester Baxter as "pioneers in this development."[35]

Boston's metropolitan park system, like the Washington plan, was as much a political as a physical achievement. It necessitated the cooperation of the commonwealth of Massachusetts, the city of Boston, and the surrounding towns, and the political methods for accomplishing such a complex project had a long gestation. Over a ten-year period, beginning in the 1830s, a series of metropolitan water commis-

sions sought a clean, protected source of water for the city, and this search necessarily extended beyond the city's topographically arbitrary borders. The water commissions wrestled with questions such as ecological versus political boundaries, resource protection versus urban growth, and public versus private ownership of essential land and utilities, all issues that would be revisited in planning the parks.

The experiences of the water commission leaders early in the nineteenth century informed the activities of their sons and grandsons as they worked to advance the idea of a metropolitan park system. Samuel Eliot, father of the Harvard president, was deeply involved in the water issue; he served as mayor of Boston from 1837 until 1839, when he lost his bid for reelection in part because of his role in the lengthy political wrangling over water. Other figures were crucial to the eventual creation of the water commission too, such as Nathan Hale Sr., the publisher of the *Boston Daily Advertiser*, who served on every one of the commissions and used his newspaper to editorialize in their favor. Edward Everett Hale continued his father's advocacy of metropolitan planning, and so did the *Advertiser* under the editorship of Nathaniel Hale Jr.[36] Charles W. Eliot, the president of Harvard, who maintained a lifelong interest in city planning, made the connection between the metropolitan water and parks commissions explicit in a letter he wrote in support of Nolen's 1908 plan for state parks in Wisconsin. In it he mentions the interconnected efforts of the state, the Trustees of Public Reservations,[37] the Metropolitan Park Commission, and the Water Board, whose land acquisition and cooperation resulted in Boston's exemplary park system.[38]

Of course the younger Charles Eliot's role in the establishment of the Massachusetts Trustees of Public Reservations is well documented, and his involvement with the

Metropolitan Park Commission, where he served as the first landscape architect, is even exaggerated in the hagiographic biography written by his father.[39] He served concurrently with Sylvester Baxter, who was the commission's first secretary and who had worked for the Hales at the *Advertiser* in the 1870s. In fact, the idea for a metropolitan park system was suggested by Baxter as early as 1891; unfortunately his crucial role is often overlooked.[40]

The Olmsteds, the Eliots, the Hales, and Baxter were at the center of this series of encounters between the city, the natural landscape, and the complex political realities that shaped the peculiarly American amalgamation of landscape design and city planning. Nolen's experience at Harvard and in Boston was permeated by the influence of these events and the ideas of these men. The school was imbued with the values of the Olmsteds and the Eliots, and, like the parks and water systems, the new landscape program was a product of the long-standing, consanguineous intellectual and civic leadership unique to Boston.[41]

Nolen was thirty-six when he graduated in 1905. He emerged from his formal education with great advantages over others whose educational paths might have been less circuitous or prolonged. Earnest enthusiasm and a knack for impressing his teachers had won him a far-flung network of mentors, colleagues, acquaintances, and friends. He was as well prepared for work in city planning as anyone emerging from an American educational institution. His Wharton experience had acquainted him with the political, economic, and social issues that both stimulated and constrained urban reform, and his Harvard years had introduced him to the most advanced American landscape ideas and planning techniques. He was an experienced and skilled administrator, a capable writer, and an effective public speaker. He had studied the history of Western art

and the structure of European cities, and he had advanced training in forestry and horticulture. All of this experience made him an ideal person to weave together the warp of urban form with the weft of Progressive social policy.

Nolen's background in political science and economics made him particularly receptive to the notion that the landscape might be an active instrument of reform rather than just a passive respite from the otherwise dismal urban environment. He learned from the Olmsteds to see the landscape as something worthy of quiet contemplation. But to an even greater degree than Olmsted Jr., he developed a utilitarian attitude toward the landscape, treating it as an armature that could structure and accommodate the interrelated social, economic, and physical needs of the modern city.

EARLY WORK AND EMERGENT PLANNING

Nolen's professional career began even before he finished at Harvard. In November 1904, as he started his second year, he undertook a landscape design for the Philadelphia factory grounds owned by Joseph Fels, who used his soap manufacturing fortune to pursue social reform and philanthropy. Fels was a supporter of ASEUT, an advocate of Henry George's tax reforms, and the organizer of the Philadelphia Vacant Land Cultivation Society.[42] The same year, Nolen was commissioned to design the landscape of a private place in Ardmore for a relative of the Perots, and in June 1905 he designed another residential landscape on Bailey's Island, Maine. But the big break came when Nolen was contacted by George Stephens, secretary of the Park and Tree Commission of Charlotte, North Carolina. The commission was endeavoring to construct Charlotte's first public park, and Nolen had been

recommended by Charles W. Eliot and Horace McFarland, of the American Civic Association.[43] Allowed to forego his final exams to pursue the project, Nolen took the train to Charlotte and went to work on Independence Park, his first public commission. This was followed by designs for Vance Park (Fig. 4), other park projects in Charlotte, and a series of residential landscape projects that Stephens persuaded his friends to commission, compensating for the very low fees Nolen was paid for the public work.

On the strength of his good start in Charlotte, Nolen opened an office in Harvard Square, an area where he would maintain offices for the rest of his life. He and Barbara moved from a house they had rented on Trowbridge Street to another on Avon Place, where they lived until 1914, when they built a house on Garden Terrace. They always lived within walking distance of the office, and in the

Figure 4. Vance Square, one of Nolen's first projects for the Charlotte Park and Tree Commission, North Carolina. *Nolen Papers, Cornell University Library*.

early years Barbara helped out from time to time while looking after the Nolen children, Jack, Barbara, Edward, and Humphrey. Her steadfastness and resourcefulness continued throughout his professional life. If there had been any question about Nolen's direction within the field of landscape architecture when he started at Harvard, it was quickly answered as the number and size of his planning commissions grew, while privately commissioned landscapes remained a sideline.

A tireless traveler, writer, and public speaker, Nolen kept a frantic pace in his early years. Just as he graduated, *Country Life in America* published an illustrated article he had written about Blytheham, the house and garden he and his family had left behind in Ardmore.[44] The following year he collaborated with Olmsted Jr. on an article analyzing public space requirements in American towns and cities for *Charities and the Commons*.[45] Two years later he wrote an introduction to a new edition of Humphrey Repton's *The Art of Landscape Gardening*, published with the sponsorship of the American Society of Landscape Architects (ASLA), which he had joined in 1905. In 1907 he traveled to San Diego to meet George Marston, an energetic civic leader to whom the city owes Balboa Park (designed in part by Samuel Parsons) as well as Nolen's city plans of 1908 and 1926. It was his first trip to the West; thereafter, he would cross the continent many times as his work took him to California, Florida, and many states in between.

By 1908 he was busy with work in Madison and ambitious plans for the Wisconsin state park system, and he was offered a position that would combine this work with teaching at the University of Wisconsin. Lincoln Steffens had glowingly described the interconnected activities of Wisconsin's government and its university in an essay called "Sending a State to College," and Richard T. Ely was,

by then, chairman of economics there.[46] The interconnected activities of the state and the university were the fullest realization of the *verein* idea, but Nolen apparently was confident enough now to maintain his independent course rather than commit to an institutional attachment.[47]

Nolen's growing practice and list of publications were complemented by his active participation in the many organizations concerned with issues of planning and urban reform. He was made a fellow of the ASLA in 1910. He was a vice president (1923) and president (1926–28) of the National Conference on City Planning and the American City Planning Institute. He served as a director of the National Housing Association, the American Parks Association, the American Civic Association, and the National Municipal League. He was a participant in the Garden City Association of America and numerous European organizations including the International Federation for Housing and Town Planning, where he was made the first American president in 1931. He attended meetings and conferences of these organizations, debating current issues, delivering papers, contributing to publications, and striving to encompass social and economic reform, physical planning, housing, and many other issues bearing on the emerging planning profession.[48]

The organizations that developed to deal with industrialized America's many urban problems had geographical as well as thematic differences. Housing reformers, for example, focused on the elimination of the wood-framed triple-decker tenement in New England, while in Philadelphia it was the filthy, crowded rear-court houses that required remedial action. But it was the appalling intensity of Manhattan's squalid tenements, and the distinctive institutions that had emerged to deal with them, that galvanized many aspects of early-twentieth-century urban reform. Nolen and other reformers had approached problems as

they arose in individual cities, but they began to realize that efforts aimed at local manifestations of urban problems overlooked their national scope. As the many different interests began to coalesce, New Yorkers brought them to a national stage.[49]

In 1909 the first national forum for the discussion of planning and urban issues was held in Washington D.C.—the National Conference on City Planning and Congestion of the Population. This meeting, which drew together the leaders of disparate urban reform movements, bore the particular imprint of Wharton-trained Benjamin Marsh and the New York City housing, settlement house, and social reform organizations. The conference was followed by a Senate hearing, during which the conference addresses were entered into the record. In Nolen's address, "What Is Needed in American City Planning?" he answered his own question first by exclaiming "everything" and then by advocating extensive social services, greater government efficiency, and a reformed tax structure. This he leavened with advocacy of more topographically determined and individualistic physical planning of American cities. The echoes of Germanic Wharton and the Anglophile Olmsteds are unmistakable.

Social issues and physical planning were at odds at the Washington conference.[50] Marsh harped on economic reforms including Henry George's single-tax ideas, which sought to keep the value of appreciating land in the hands of the community and thereby deprive the land speculator of his unearned increment of profit. This emphasis aroused fears that city planning meant broad government intervention in traditionally unfettered property rights. Olmsted Jr., who shared his father's skepticism about applying European models to America's very different "climatic, economic, social and political conditions,"[51] sought to disengage planning practice from contentious social and

economic reforms. He opposed the single-tax idea and advocated a close study of planning methods and technique.[52] Between the radical Marsh and the cautious Olmsted Jr. stood Nolen. He believed (as his mentors James and Patten did) that economic and social issues were unavoidably linked to government policy, and he advanced a mild, Americanized version of German state socialism intertwined with the physical and political reform of cities; this is what he meant by "comprehensive planning." His pragmatism, though, led him to embed his goals in the rhetoric of paternalism, cooperation, and voluntary community action, which reflected the values of most of his clients and the realities of his era.

Marsh was right, a single land tax would have provided a tidy mechanism to bring private land use into conformance with the communal goals of a city plan, but such a radical reordering of property rights was a frightening prospect, especially to property owners.[53] Eventually Olmsted Jr.'s cooler head prevailed, and the second National Conference on City Planning and Congestion of the Population, held in Rochester, New York, the following year, set the organization on a path that marginalized Marsh and dodged thorny questions of social and economic reform.[54] Following Olmsted's lead, Nolen addressed the second conference on the important technical subject of land subdivision. Afterward he was asked to join the General Committee of the renamed National Conference on City Planning, which became the key professional organization where the range of American planning practice was explored and developed.[55]

THE AMERICAN CONTEXT

Nolen's admiration for the procedures and results of German state socialism did not blind him to the need to

adapt European ideas to an American context. One particular idea he championed was the adoption of building and loan societies such as the one that had helped him construct his own house in Ardmore. His paper "A Good Home for Every Wage Earner," delivered in various forms in the pre–World War I period, illustrates both the course he was able to navigate between economics and city design and his prescient advocacy of financing innovations that would eventually transform housing in America. Such locally developed institutions crossed permeable state borders with relative ease, but when reformers advocated the wholesale importation of German or English practice that relied on direct intervention by government, constitutional impediments often frustrated their efforts. Though European spatial composition and physical organization were readily adaptable to American needs, the social, legal, and economic ideas and methods that had given rise to them were harder to import. Planners in the United States would struggle for decades to develop the legal techniques needed to implement their plans within the American constitutional framework.[56]

The federal government was constitutionally unable to attend to most urban problems because the power to do so was vested in the states. Cities were forced to seek charter revisions from their state legislatures to take on many urban problems, especially those having to do with eminent domain, annexation, borrowing limits, and zoning—all crucial elements of any planning effort. Structural reform of city government faced similar obstacles. This left city governments relatively weak, and consequently it often fell to private organizations to develop proposals for the physical environment, just as they did in the fields of governmental and social reform. Many of Nolen's early projects were

funded by boards of trade, chambers of commerce, and similar private civic organizations, rather than by governmental entities.

Though civic groups often could muster the funds for plans, it was another matter entirely to identify the legal mechanisms, develop the political will, and find the money to implement them. City Beautiful building ensembles, diagonal boulevards cutting through existing checkerboard street systems, and other widely advocated improvements—no matter how appealing or necessary—proved to be extraordinarily difficult to accomplish. In the absence of the imperial power of Napoleon III or the bureaucratic guile of Baron Hausmann, the physical structure of American cities proved nearly intractable. École des Beaux-Arts–trained architects of the era such as John Carrère and Charles McKim aspired to French grandeur in their city plans, and occasionally they achieved it (for example, in Cleveland and Washington, D.C.), but these were extraordinary examples where the government sponsored the plans and funded their implementation.

The fluid market for inexpensive empty land differentiated the development of American planning too. If the congestion of America's older cities was intractable, there was an underdeveloped hinterland, some of it just a trolley extension or railroad tunnel away from the heart of the problem. The need to deal with these vast lands contributed to the dominance of landscape architects such as Olmsted Jr., Warren Manning, and Nolen within the emerging planning profession. In Europe architects and engineers such as Raymond Unwin, Josef Stübben, and Eugène Hénard dominated planning discourse. But American architects, who concentrated on hard-to-implement axial plans, on grandiose civic centers, or on local housing reform, usually

left planning of open land at the municipal or regional scale to landscape architects.[57] The low density of many American cities allowed the landscape architects to use empty space to obviate problems of abutment and proximity that required complex architectural solutions in denser European cities. Moreover, the American preference for detached housing loosened the tethers between architecture and planning, allowing the discourse in these professions to drift apart while strengthening the connection of landscape architects to planning in all but the most densely built cities.

Nolen's decision to concentrate on smaller cities reflects these American circumstances. He recognized that opportunities to solve urban problems with open space rather than architecture were more likely to be found there; that detached, individually owned houses were more feasible there; and that strong, voluntary civic institutions and smaller governments were more likely to act in concert there. Perhaps most important, the acquisition of property in advance of development was more economical there. Furthermore, the impulse toward decentralization was firmly embedded in American traditions where hostility to big cities ran as deep as the idealization of small-town life.

REPLANNING

The early plans and reports produced by Nolen's firm varied greatly in scope, in detail, and, most important, in the degree to which they were implemented. Many of them had no life beyond the documents themselves, though at least these were actively circulated within the planning community in the United States and abroad.[58] Some cities

used his firm's plans to accomplish one piecemeal aspect of a larger project. Sometimes, though, Nolen achieved significant results. These were the projects he included in his books, which chronicle the variety and comprehensiveness of plans that were, at least in part, implemented. Nolen emphasized built accomplishments.

In 1912 he published *Replanning Small Cities,* which sums up the first busy phase of his career with chapters on Roanoke, Virginia; Reading, Pennsylvania; Madison, Wisconsin; San Diego, California; and Montclair and Glen Ridge, New Jersey. Each chapter explores a different set of problems and solutions. The chapter on the old colonial city of Reading, for example, presents Nolen's attempt to deal with a city hemmed in by difficult geography on all sides, where a rigid grid of narrow streets was clogged by traffic congestion and its inhabitants were suffocating in densely packed housing. This project went on for years, not with altogether happy results.[59] But later, across the narrow Schuylkill River valley in Wyomissing, a better process led to one of North America's most elegantly planned suburbs. In part the work of the opinionated, incandescent German planner Werner Hegemann (who ridiculed a few of Nolen's recommendations for Reading), it contains some of Nolen's most beautifully designed residential streets.[60]

Chapters on Madison and San Diego reveal the persistent influence of the Washington mall on Nolen's early planning vocabulary. Most of his civic center plans of this period rely on such elongated rectangular spaces, precisely ordered by continuous rows of civic buildings. The form is a virtual trope of the City Beautiful movement, and though Nolen and nearly everyone else replaced the rhetoric of the City Beautiful with the more utilitarian "city practical," the preoccupations with the aesthetics of civic grandeur per-

sisted. The lack of architectural imagination in these civic centers is balanced, however, by the thoughtful integration of rail, vehicular, pedestrian, and park systems. Nolen was able to transform the future of Madison and San Diego by untangling these pressing early-twentieth-century problems; moreover, he successfully advocated the acquisition of land for parks and parkways that soon would have become unavailable or unaffordable. The advantage of dealing with such problems while these cities were still small is evident.

Careful, innovative thinking is equally apparent in his plans for the adjacent New Jersey towns of Glen Ridge and Montclair. Already these towns were following the pattern of diffuse suburban development that carpeted the North American landscape by the end of the twentieth century. Nolen proposed the construction of lower-priced houses to increase economic diversity; civic and commercial centers to provide a convenient focus for community life; and interconnected parks, parkways, and pedestrian ways to improve access to Essex County's extensive park system. These proposals were an early recognition of deficiencies in the emerging suburban pattern, and a partially successful attempt to remedy them. Roads and parks in these towns were altered without too much opposition, but efforts at greater economic diversity inherent in Nolen's housing recommendations were less welcome.

The emphasis in *Replanning Small Cities* is on practice rather than theory, though the case studies are combined with summary chapters that provide a more general view of Nolen's developing ideas. The appendices, full of model state legislation, indicates his increasing awareness of the importance of legal issues to comprehensive planning. As the title indicated, these projects involved *re*planning exist-

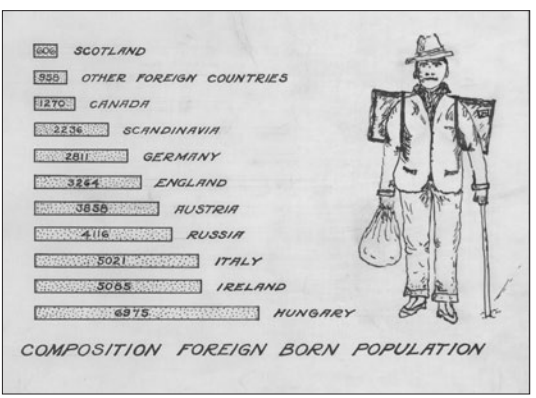
ing towns and cities, where prosperity and growth had outrun the physical constraints imposed by history or geography. Each provided a distinctive plan of action for Nolen's civic-minded clients who wanted to reform their governments and their societies as well as the landscapes and cities that contained them. Able to see the needs for replanned streets, parks, and zoned districts in their political and economic contexts, Nolen applied theoretical principles, using his administrative skill and statistical training to collect, organize, and synthesize the many bits of disparate information into coherent planning proposals.

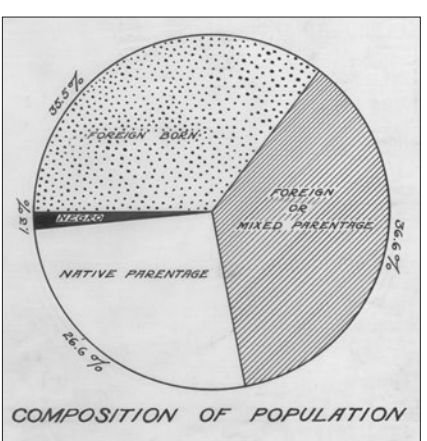
Nolen was confronting, on a small scale, age-old urban problems of decay, congestion, and change. New building types and transportation technologies had disrupted the traditional spatial, physical, and social matrix of the city, resulting in overcrowding, real estate speculation, and wide swings in property values. Smoke-billowing factories of unprecedented scale grew up beside residential neighborhoods, creating awkward and unhealthy adjacent functions that constrained industrial efficiency and added dismal living conditions to the other ills. City Beautiful malls and boulevards addressed only some of these problems, and Nolen worked hard to develop additional ideas and techniques, such as zoning to control the use of land and the density of buildings, housing for wage earners, and parks with recreation facilities for everyone.

Big plans were hard to implement, even in small cities, and the sensible, relatively modest proposals in *Replanning Small Cities* met with stiff resistance, which took legal, political, and economic forms. American municipalities were hamstrung by their governmental structures, so Nolen and his colleagues had to persuade, cajole, and persist to accomplish every small part of what they proposed. In circum-

stances where a street widening or land acquisition for parks or watershed protection might stir sufficient controversy to derail the whole plan, comprehensive replanning was an elusive goal.[61]

Despite the difficulties, Nolen made important contributions to the evolving practice of planning, which included the integration of social and economic concerns within the framework of physical planning techniques. This was especially true in his 1914 plans for Bridgeport, Connecticut,





Figures 5 and 6. Nolen used charts to show the foreign-born population of Bridgeport, Connecticut. This and other information was synthesized to produce surveys and planning reports. *Nolen Papers, Cornell University Library*.

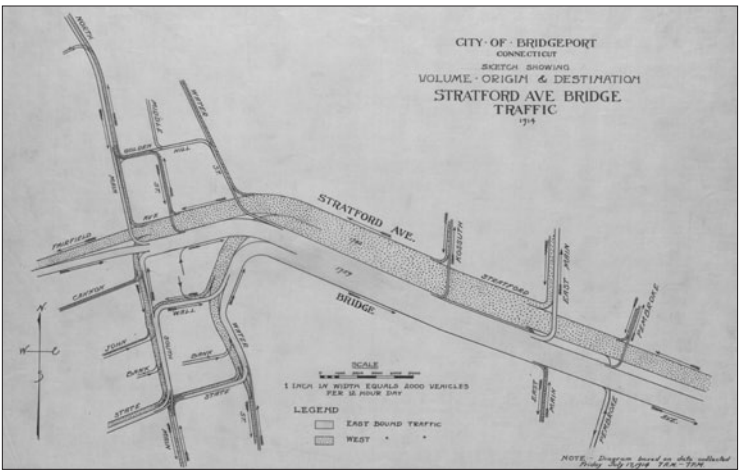


Figure 7. An analytical diagram recording traffic flows in Bridgeport. Nolen supported his planning proposals with diagrams that interpreted the statistics and other information he collected. *Nolen Papers, Cornell University Library.*

where elaborate social and physical survey information was used to produce a city plan of unprecedented comprehensiveness and scope (Figs. 5–7). He continued to refine and elaborate techniques developed there into clearer and better-organized maps and reports such as one for Akron, Ohio, in 1917.[62] In these projects Nolen was able to truly synthesize the two parts of his background: the Olmsteds' landscape art and the social science of his Wharton years. The expression of this synthesis was the city plans themselves, richly drawn, laden with information, and suggestive of otherwise invisible relationships of part to whole (Fig. 8). For these cities and some others such as Flint, Michigan, and Asheville, North Carolina, where Nolen produced plans in the 1920s, the art of landscape design is subsumed in the larger project of the city with all its cultural, economic, and physical complexity.

Figure 8. City maps such as these were used to show the overall scope of Nolen's replanning proposals; they were often accompanied by separate maps to show parks, roads, or zoning. *Nolen Papers, Cornell University Library.*

THE GARDEN CITY

New building on open land met much less resistance than rebuilding. It fit easily into established patterns of ur-

ban growth where landowners routinely platted new streets on private property at the urban edge. In America these plans often just extended the street grid, but under the influence of Olmsted Sr. and to some degree the Germans, picturesquely composed and topographically responsive urban extension plans entered the repertoire of American planners. Knowledge of German technique was often filtered through English interpreters such as Raymond Unwin. His 1909 book *Town Planning in Practice* shows the influence of Camillo Sitte's medievalizing, picturesque urban composition technique integrated into a broader English proposal for a new urban beginning known as the garden city.

Nolen used Charles B. Purdom's definition of the garden city: "a small town organized for modern industry and healthy living; of a size that makes possible a full measure of social life; but not larger; surrounded by a permanent belt of rural land; the whole of the land being in public ownership or held in trust for the community."[63] Such a mix of physical planning and social reform avoided the problems of existing cities, and it seemed ideally suited to American circumstances, where agrarian beginnings and Jeffersonian notions of democracy had evolved into an artistic cultivation of the rural ideal. The idea was first proposed in 1898 by Ebenezer Howard in *Tomorrow: A Peaceful Path to Real Reform*. Howard had been struck by Edward Bellamy's 1888 utopian socialist novel *Looking Backward* (he persuaded a London publisher to bring out an edition by agreeing to compile an index and buy a hundred copies). Though he eventually decided that Bellamy's conception of the all-encompassing state as one gigantic trust was the antithesis of true socialism, the idealized harmony of communal ownership and the tidy urban order that the novel described had a lasting effect.[64]

Howard's garden city diagram was taken up in England with great enthusiasm and grafted onto an earlier tradition of paternalistic company towns such as Bourneville and Port Sunlight, and by 1904 Letchworth, the first garden city, designed by Raymond Unwin and Barry Parker, was under construction in Hertfordshire. Not just a housing scheme, it was intended as a self-sustaining civic entity, complete with commercial center, low-density housing, and an enclosing agricultural perimeter—a growth-limiting device developed in imitation of the German tradition of municipally owned peripheral lands. Social and economic reforms also were integral to the plan; all the land and many of the improvements were communally owned.

In the United States the garden city model was adjusted to reflect local needs and realities. Co-ownership schemes, intended to capture the unearned increment of profit for the community rather than for the developer, proved a hard sell in the freewheeling, speculative real estate market of North America. Many of the other communitarian components of the scheme also failed to cross the Atlantic intact. But what did take hold was the low-density garden city *form*: a geometrically ordered town center devoted to civic and commercial activities; with radial connections to curving residential streets; surrounded by controlled undeveloped land; and with occasional provision for industry on the periphery. It proved to be a resilient and persistent model. By taking advantage of new transportation systems and less expensive outlying land, it offered a physical development pattern as a neat solution to overpopulation of the cities and depopulation of the countryside. Furthermore, it appealed to the peculiar American penchant for the fresh start.

American examples were especially deficient in cooperative or public ownership of the land, as Nolen was uncomfortably aware. He wrote that this was more English

in character than American, and explained that Purdom's definition of the garden *suburb* was more applicable in America:

1. The area must be town-planned.
2. There must be a limitation of houses to not more than twelve per gross acre.
3. Provision must be made for social amenities, including open spaces.
4. As far as possible the good natural features of the site must be preserved.
5. An element of cooperative or public ownership of the site must exist.
6. The return on capital must be limited.[65]

He concluded that Purdom's conditions of land ownership found only a faint echo in American industrial villages where land was sold at low prices without speculative profit, or where return on invested capital was voluntarily limited by investors.[66] And even these conditions were only occasionally met. Although to Nolen and American social reformers the grass looked greener on the other side of the Atlantic, many financial aspects of the garden city that they admired ultimately proved untenable in England. (In 1928 Purdom was forced to resign his position at Welwyn, the second garden city [*NTFO*, p. 140], and shortly thereafter, "the garden city and its inhabitants were excluded from any interest in the company or its profits.")[67]

The social circumstances of the Americans were as different from those of the English as their economic and physical situations were. The English were dealing with population movement from the countryside to the crowded cities; the Americans faced the same problem, in addition to the greater challenge of assimilating the huge influx of im-

migrants, with their foreign languages and unfamiliar customs. The English needed mainly to house their population; the United States had to Americanize them. Though many immigrants readily acquiesced, native-born citizens, alarmed by the accelerating social and physical heterogeneity of their cities, constructed social machinery to aid such transformation. To some degree planners accepted their role in this, especially when making housing and neighborhood arrangements for the foreign-born, the rural poor, the wage earners, and others whose assimilation they sought to insure.

The garden city evolved rather quickly in America, mixing with locally developed ideas about City Beautiful civic centers, extension suburbs, utopian settlements, and industrial housing. Mariemont, Ohio, is Nolen's purest realization of the garden city, but most of his new towns and suburbs are hybrids that combine these locally familiar planning notions with elements of the garden city. An extreme American hybrid was the *farm city*, illustrated by Nolen's project for Penderlea, North Carolina (*NTFO,* p. 12), which was intended to mitigate the social isolation of the American farm by bringing cooperative management and urban social life into its midst. This project was conceptualized by Hugh MacRae, a banker and land developer, and it involved others such as Albert Shaw and Elwood Mead, who had thought long and hard about solving the twin ills of urban congestion and rural depopulation with a combination of modern agricultural methods, communal cooperation, and education. Nolen did the land planning, and the project also included soil experts, agronomists, and others to teach the new farmers advanced techniques and cooperative economics. Penderlea was the confluence of scientific agriculture, social work, and the utopian tradition.[68] But "farm city" was an oxymoron; the challenge of combining urban density

with farm plots of sufficient size for economical cultivation was too much for even the best planners. And there were good reasons, after all, why people had moved to the cities in the first place, and why immigrants stayed there.

After *Replanning Small Cities*, Nolen produced two books of a more theoretical nature. He edited *City Planning* (1916), which was an important collective effort of the American planning profession. An essay by Olmsted Jr. provided an overview and introduced chapters by leaders of the profession, each devoted to different aspects of planning technique ranging from sewers and transportation to condemnation laws and zoning. One of Nolen's two contributions was an essay on land subdivision and its bearing on housing configurations, but this was as close as anyone got to the subject of housing. The book, sponsored by the National Municipal League, proved sufficiently popular and useful to be reprinted in a second edition in 1929 with additional chapters, including one on regional planning by Nolen, who was always looking to expand the scope of American planning.

Just after the Great War, in 1919, the American City Bureau published *New Ideas in the Planning of Cities, Towns and Villages*, a little book Nolen had produced as a series of lectures to fill the idle hours of the Doughboys, whom General Pershing was determined to keep occupied with more than the customary activities of a victorious army.[69] This government-sponsored pedagogical effort, structured very much like the ASEUT courses Nolen had once administered, never really got going before the idle troops were hastened home, but Nolen turned the abandoned textbook into a citizens' manual on city planning.[70] It provides a concise, if rather rudimentary, summary of Nolen's theory.

During the war Nolen's office kept busy with work for the United States Emergency Fleet Corporation and the United States Housing Corporation, two unprecedented federal planning initiatives intended to alleviate the severe shortages in the housing markets near crucial matèriel production centers. Nolen and other planners, eager for the opportunity to wield federal power and the federal purse, set out to demonstrate the effectiveness of ideas so often frustrated by local intransigence and parsimony. But the quick end to the war stopped most of these projects before they were built, and Congress hurried to dismantle them—wanting to allay concern that they had used the war emergency to tread on state and private-sector prerogatives.

NEW TOWNS FOR OLD

After the war Nolen entered the most active and productive phase of his career, in the midst of which the present volume, *New Towns for Old (NTFO)*, was conceived. After six years of intermittent effort, an edition of two thousand finally was published in 1927, just as Nolen's career reached flood tide during the building boom of the 1920s. Like *Replanning Small Cities*, the book was a careful selection of a few planning projects meant to represent the range of Nolen's work. It includes case studies adapted from planning reports, an introduction by Albert Shaw, and several sections devoted to a discussion of the history and the future of town planning.

One of the most interesting aspects of the book's history is that Nolen submitted the first *NTFO* manuscript for publication with Sylvester Baxter identified as its author. Baxter (Fig. 9) had begun his journalistic career at the *Boston Daily Advertiser* in the 1860s. He spent 1875–77 studying in

Figure 9. Sylvester Baxter. *New England Magazine, Aug. 1898.*

Leipzig and Berlin, where he worked as a foreign correspondent. Baxter, too, was influenced by Edward Bellamy's *Looking Backward,* for which he wrote an introduction. They were close friends, and Baxter participated in the short-lived political party spawned by Bellamy's ideas. Eventually he retreated from this extreme and worked tirelessly to promote the idea of municipal planning along the lines of the much-admired German model.[71] He wrote on a range of subjects from the treatment of tuberculosis to Spanish colonial architecture, but the chief focus of his civic activism and journalistic enterprise was city and park planning in Boston. His writing on city planning and his translations of essays by the German architects Theodor Fischer and Cornelius Gurlett appeared in *Architectural Record*, the *Century, Atlantic Monthly*, and elsewhere. Baxter had a wide acquaintance in civic reform and literary and artistic circles including figures such as Olmsted Sr., whose work he championed, the novelist William Dean Howells, and the painter Frederic Church. He was married

to Lucia Millet, sister of the painter Francis D. Millet. His wide network intersected Nolen's at many points, but how long they had known each other is not clear. Certainly they were acquainted: Baxter had supported the Wisconsin park plan in 1909, and they both had delivered papers at the second National Conference on City Planning and Congestion of the Population in Rochester.

Baxter was seventy-one years old in 1921 when he agreed to take the project on, during his annual winter sojourn in Puerto Rico. Nolen provided material including an article written by his employee Guy Wilfred Hayler, which had appeared in the December 1920 issue of the American *Review of Reviews*. With the exception of Mariemont, Hayler's article had covered each of the projects in *NTFO* and formed the kernel of the book. After writing new sections and polishing old ones, Baxter finished working on the manuscript in February and sent it to Nolen, titling it *New Towns for Old* and listing himself as the author. Nolen then submitted it to Charles Scribner with a letter describing it as a book about his work written by Baxter. Scribner rejected the manuscript, and Nolen repeated the process with Houghton Mifflin. After they rejected it too, he sent it to Matilda Weil, an agent, editor, and book doctor, who suggested that Nolen would have more success finding a publisher if the book were both about him and by him. So he wrote Baxter that he had chosen "to rewrite and remake the book under my own authorship, as originally contemplated."[72]

Comparison of the Baxter manuscript[73] with Nolen's planning reports on which it is based makes clear that Baxter's original work is concentrated in the first two chapters on the morphology of American towns, which synthesize ideas of Camillo Sitte and Olmsted Sr., applying them to an analysis of the New England town. Here the advantages of

irregular and diagonal streets over the "indolent rectangularity" of gridiron plans are stressed, as is the continuation of local building traditions, to assure each locality the opportunity for its "finest self-expression." Baxter provides explanation and background, putting the development of New England towns and cities in the context of contemporary planning ideas.

Throughout the book Baxter's deft editorial hand lends grace and color to the technical prose style of the Nolen planning reports. Once Nolen reasserted his claim to authorship he added a few paragraphs to the beginning and end of some sections, and revised Mariemont and the final chapters to cover developments in the interval between Baxter's manuscript and the publication of the book. The joint authorship of the book ought to be plainly recognized.

Why Nolen hired Baxter to work on the book is a bit of a mystery; he had produced books before, and he wrote and lectured with a fluid if not inspired style. Maybe the abundance of work in the 1920s provided both the need and the resources to delegate this job, or perhaps he thought Baxter's name would appeal to a wider audience. Certainly Nolen recognized Baxter's eloquence and zeal, writing in his initial proposal of Baxter's "facility for describing works of landscape architecture and town planning."[74]

At Weil's suggestion, Nolen sent the manuscript to the Boston publisher Marshall Jones, who had brought out a number of books by the architect Ralph Adams Cram. Jones replied that it was a project he could "enthusiastically get behind"[75] and suggested that Nolen find a well-known figure to write an introduction. Nolen asked Albert Shaw, the editor of the *Review of Reviews*, who had a lifelong interest in urban affairs and eventually published the Kingsport chapter along with an admiring editorial. He and Nolen were not well acquainted, though they must

have had some contact in connection with the farm city project in North Carolina. Shaw readily agreed to write the introduction.[76]

Like Baxter, whom he knew fairly well, Shaw had spent his life as a journalist.[77] After an early career in Iowa, where he attended Iowa College (later Grinnell) and edited the *Grinnell Herald,* he went to Johns Hopkins and studied under Henry Baxter Adams and Richard T. Ely. There he befriended Woodrow Wilson (a fellow glee club member), whose presidential papers he later edited. Shaw wrote his PhD dissertation on Icaria, the utopian socialist community in Iowa—a subject that was suggested to him by Ely.[78] After graduation he went to Europe to explore the intricacies of its city governments, and in 1895 he published his research in two volumes: *Municipal Government in Great Britain* and *Municipal Government in Continental Europe*. These books are dense with useful information on all aspects of urban affairs including planning, parks, streets, sewers, administration, and taxation. They are remarkable for the thorough comparative analysis they bring to varied techniques of European states and municipalities, which are catalogued for Shaw's American readers in glaring contrast to the dishevelment of their own urban situations. During a visit to England, Shaw met W. T. Stead, the crusading editor of the English magazine *Review of Reviews*, and with Stead's support he started an American magazine of the same name. Shaw continued to edit the American *Review of Reviews* from 1890 until 1937, advancing a broad reform agenda and championing the policies of Theodore Roosevelt. The magazine chronicles the development of Progressive-era causes and opinion.

Throughout Shaw's introductory essay he emphasizes the revival of the communitarian impulse and the distinctiveness of American circumstances. The essay displays a

confidence that civic groups, with expert advice, can implement needed and far-reaching change. As Nolen did throughout his career, Shaw emphasizes the role of new technologies such as the telephone, the radio, and the automobile in the movement toward more decentralized living arrangements. Both men imagined a rejuvenation of small-town life as the benefits of modern conveniences spread beyond the cities. Neither, apparently, was able to foresee how these technologies might also lead to further urban concentration, suburban sprawl, and the erosion of small-town life.

Shaw provided a perceptive and enthusiastic assessment of Nolen's achievements, placing them in the Progressive-era context that Shaw himself had helped develop:

> Mr. Nolen has for years seen with undimmed eyes this vision of a restored, harmonized, and beautified country. Happily there are many people also who can share the vision; but there are not many men or women who are so capable as Mr. Nolen of turning from the pictures that his imagination conjures up, to the very difficult but essential task of working out the picture in the concrete—'on the ground,' so to speak. (*NTFO*, p. xxii)

The participation of Baxter and Shaw in *New Towns for Old* makes it a document that spans a long and crucial phase of American urban history, connecting the early-nineteenth-century utopian ideas that Shaw explored in Icaria with Baxter's involvement in Bellamy's utopian vision of industrial-age Boston. The idealism of these initiatives forms a backdrop for their pragmatic development and transformation in the Progressive era. Both men shared with John Nolen a recognition of the need for the reform of the American urban situation, and the desire to

make use of the German social, economic, and physical examples they had studied firsthand. Many of the ideas that the two journalists had spent their lifetimes studying and promoting were being realized in Nolen's work: he was not just fixing old towns, he was building new ones—logical, efficient, convenient, and expansive—a fulfillment of the Great Civic Awakening.

THE PROJECTS

With its individual case studies, *NTFO* is a practical companion to the more theoretical *New Ideas for the Planning of Cities Towns and Villages*. Each project is framed as a set of specific local planning problems—new towns, satellite towns, new industrial cities, new residential suburbs, replanned colonial towns, new company towns, and a government-sponsored housing project. Each illuminates a different aspect of Nolen's remarkably diversified practice.

Walpole

In November 1912 an invitation to lecture in Walpole, Massachusetts, on either civic awakening or German city planning[79] signaled the beginning of Nolen's relationship with the remarkable Bird family, who sponsored nearly all of his work in the town. From 1913 until 1930 Nolen worked on Walpole park and town planning, on the Bird family's estate, and on other projects including Neponset Garden Village, which the Birds commissioned but never built. The progress made in Walpole was due, in large measure, to the wealth and political power of the Bird family, who owned Bird & Son, a paper company founded in the eighteenth century and at the time the town's largest

employer. Charles Sumner Bird Jr. was heir not only to this thriving industrial concern but to a political dynasty as well—a tradition carried forward by his brother Francis William Bird, who was Elihu Root's law partner and a leader of the Progressive Party in New York State.[80] In the Bird family Nolen had found clients who embraced new planning ideas as well as social and economic reform. Bird Jr. became an enthusiastic city planning activist, and Nolen provided guidance, instruction, and advice for his many efforts including passage of city planning legislation in Massachusetts.

Bird & Son had a history as a paternalistic employer. In 1903 the company had cut the workday from twelve to eight hours without commensurately reducing wages. The family and the company took other steps to improve living conditions for employees, including making contributions to the town's schools and libraries and establishing loan and insurance operations that enabled employees to buy and build houses for themselves on advantageous terms. Some of these efforts arose from the influx of foreign-born workers, who accounted for a large part of the town's increasing population. In neighboring towns these workers were often housed in wood-frame triple-decker tenements, a building type that subverted the traditional physical and social matrix of the New England town. The Bird family sought housing alternatives closer to familiar village patterns.

Neponset Garden Village, planned for East Walpole near the rail station and the Bird & Son factory, was the most ambitious of Nolen's plans. Together, Nolen and Bird's representatives sought advice from the Anglo-Canadian planner Thomas Adams, G. Trafford Hewitt of Hampstead Garden in London, and others in their efforts to devise the legal structure for the novel cooperative own-

ership arrangement they envisioned. Neponset would be a true garden village that satisfied both physical and economic definitions, and it would be the first one in America if they could build it before a similar scheme by Arthur Comey and Warren Manning at Billerica, Massachusetts. Plans advanced through several stages, and Bird went as far as consulting Mann and McNeille, a New York firm with industrial housing expertise, about the architecture of the individual houses. Unfortunately the changed economy of the prewar years and then the untimely death of Francis William Bird in 1918 led the family to alter their plans.[81] After the war they used most of the land for Francis William Park, a memorial to their eldest son. Thereafter, new housing was built on single lots or in small groups on land along the margins of the new park and interspersed through the town.

In *NTFO* Nolen never mentions the bitter disappointment of Neponset Garden Village (Fig. 10); rather, he characteristically emphasizes the many other aspects of the Walpole plans that were completed. His improvements in-

Figure 10. An aerial perspective of Neponset Garden Village in East Walpole, Massachusetts. *Nolen Papers, Cornell University Library.*

cluded street realignments, parks, playgrounds, and many related efforts to solve physical problems large and small. A good deal of effort was expended on schools (which were designed by R. Clipston Sturgis, the Boston architect who would later interact with Nolen in the war housing efforts) to insure that their grounds harmonized with the town plan. Other accomplishments included establishing a town forest on land donated by George Plimpton, and the construction of Memorial Park in Walpole Center, which was led and in part financed by Phillip Allen, a Bird & Son partner.[82]

Francis William Park is Nolen's most richly conceived and fully realized public park (Figs. 11, 12). It reflects his desire to integrate a variety of accommodations for sport and leisure activities within the general aesthetic framework of an Olmsted-style park; for him the spiritual uplift of nature was complemented by the social benefit of organized physical activities. The long meadow in Nolen's park recalls Olmsted Sr.'s Prospect Park masterpiece of the same

Figure 11. Francis William Park, in Walpole, Massachusetts, included ponds, lawns, and wooded glades, as well as gates at various entry points such as the main one shown here. *Nolen Papers, Cornell University Library.*

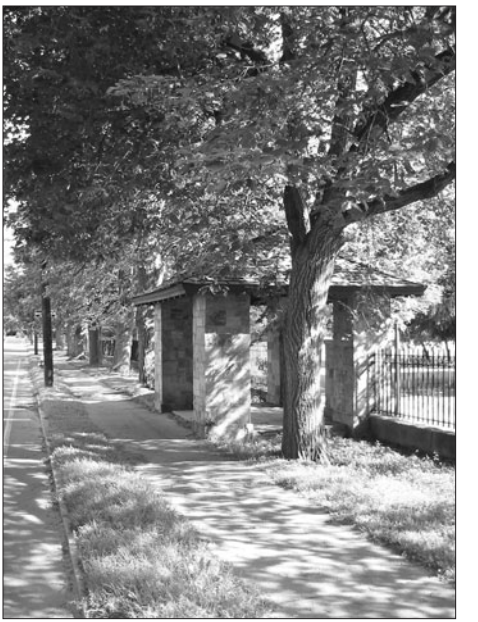


Figure 12. Another entry to Francis William Park. This one connects a residential neighborhood to a corner of the park set off with coniferous trees and planned for tennis courts; it is now outfitted with playground equipment. *Photograph by Charles D. Warren.*

name, and the park's bridges, streams, and ponds evoke a similar feel in a slightly miniaturized form. But Nolen flanked his tree-fringed lawn with tennis courts and an outdoor theater, facilities that undermine its purely pastoral qualities. Similarly the stream, which gently wends its way through the park, was retained by a combined bridge and dam to create a concrete-bottomed pool for swimmers. Nolen allowed the passive pastoralism of Olmsted Sr. to yield to more active recreational pursuits, but it went only so far—playgrounds and other active sports were accommodated on separate land elsewhere. The Birds provided an endowment for the upkeep of the park, and in 2003 it was given to the Trustees of Reservations.

Some other efforts were only a partial or temporary success. Walpole Center was the location of a second Nolen

park, Memorial Park, which was designed to integrate active and passive uses even more closely. Again a bridge and dam were combined to form a pond surrounded by woods and winding paths (Fig. 13). Playing fields were aligned with carefully located civic buildings in an attempt to integrate these diverse uses into the scenic structure of the landscape. But encroachments by parking lots, new buildings, and swimming pools have nearly obliterated the careful balance Nolen sought to achieve. Though the bridge/dam and the pond it forms still suggest what might have been, the lack of clear park boundaries combined with thoughtlessly placed new buildings and limited maintenance have whittled down the park to half its original size, and the pond and woods are just a beautiful vestige of the original design. The streams in these parks are tributaries to the

Figure 13. Memorial Bridge, intended to be a centerpiece of Memorial Park in East Walpole. It overlooks a pond formed by the small dam below it. *Photograph by Charles D. Warren.*

Neponset River, an upland part of the watershed of the Boston metropolitan parks system. Some of Nolen's other efforts to protect and enhance this watercourse also met with mixed success. It was still a vital industrial asset in those years, and Nolen was never able to bring all the land he thought necessary under town ownership or control.

The Birds became advocates for many of Nolen's ideas. Charles Sumner Bird Jr.'s mother, Anna, supported an effort to make planning a part of the school curriculum in Norfolk County, and both she and her son sponsored lectures to help convert their neighbors to the idea of planning.[83] Nolen was always eager to publicize his work, and in Bird Jr. he found an active collaborator. Determined to advertise Walpole as an exemplary small progressive city, Bird hired John A. Murphy to work with Nolen in the production of a book recording their efforts.[84] Nolen provided drawings, ideas, and text, and Murphy organized the material and did most of the writing of *Town Planning for Small Communities*. Published in 1917 as part of the National Municipal League series, it is a virtual manual, laying out the example of Walpole as a template for the physical, social, governmental, and economic reform of small towns.

Kingsport

In mid-October of 1915 Nolen received a note from J. H. Sears of D. Appleton, the publisher of *City Planning*. Sears mentioned "a friend" who was interested in building two or three small towns along a rail line. Other correspondence followed, and a meeting in New York was arranged for New Year's Eve between the friend, John B. Dennis, and Nolen. Dennis was chairman of the Securities Company and one of three partners in Blair and Co., a Wall Street firm dominated by Clinton Ledyard Blair, the grandson of

the railroad baron John Insley Blair.[85] The meeting must have gone well because they immediately made plans for Nolen to visit the town site in eastern Tennessee.

In 1915 Kingsport was just an unpaved street grid dotted with tents and utilitarian frame buildings along the tracks of the Carolina, Clinchfield and Ohio (CC&O) railroad, which crossed the Blue Ridge Mountains to link Spartanburg, South Carolina, to Elkhorn City, Kentucky. The CC&O rail project had been started by George Carter, a local man who, having assembled the land and started construction, had encountered financial difficulties before he could complete it. In 1905 he turned to an investment syndicate including Dennis, Blair, Thomas Fortune Ryan, and others, who acquired control of the unfinished railroad and much of its land.[86] In 1914 Dennis, Blair, and Mark W. Potter purchased an additional ten thousand acres of Holston River valley land from Carter and formed Kingsport Farms, announcing their intention to create one of the finest farms in the South.[87] This agrarian project may have been just a front to conceal their real intentions to build a town; eventually Kingsport Farms joined Kingsport Improvement Corporation in the complex corporate web that included the railroad, Cumberland Corporation (coal mines), the Securities Company, Blair and Co., and the individual interests of the capitalists who controlled them.

Blair's family had generations of experience in railroads and real estate, and Ryan, a flamboyant Wall Street capitalist, had made a fortune in street railways and then an even larger one through the acquisition of the Equitable Life Assurance Society. Later, using Blair and Co. as a front, he had gained control of the Seaboard Air Line Railroad after a bitter eight-year struggle. Dennis, Ryan, and the other investors were practiced in manipulation of the complex corporate structures and huge concentrations of capital that

Wall Street banking interests had developed by the beginning of the twentieth century.[88] These newly developed financial and management techniques played an important part in the planning of Kingsport.

Planned new towns had followed the railroads west, and by 1916 the real estate speculation that accompanied new rail lines was a well-established American practice.[89] The CC&O rail line tunneled through mountains and spanned deep river valleys, and the huge sums needed to build it spurred the investors to implement a scheme of resource exploitation, industrial integration, and real estate development that was a far more ambitious conception of a railroad town than the simply platted grid of streets, which had sufficed in earlier times.

John B. Dennis took the lead in the Kingsport project, as he had in the railroad.[90] He was Nolen's initial contact, but as things progressed Nolen also worked closely with John's brother Henry and with J. Fred Johnson, a native of Tennessee who served as a local point man, land sales agent, and general manager of various Kingsport interests. Johnson was the brother-in-law of George Carter, and though his financial stake in the project was minor he had a proprietary attitude toward the town, which its people have acknowledged by naming many of its facilities for him. His repeated interventions, together with directives from the strong-willed Dennis brothers, tended to erode Nolen's control over the planning of the town.[91]

Nolen came late to this project, following in the trail of William Dunlap, a civil engineer who had first laid out the town for the railroad in 1906 (Fig. 14).[92] Various other civil engineers who had provided designs for water and sewer systems also preceded Nolen, and perhaps the architect Clinton Mackenzie did too. Mackenzie was Commissioner of Tenements in New Jersey and a board member of the

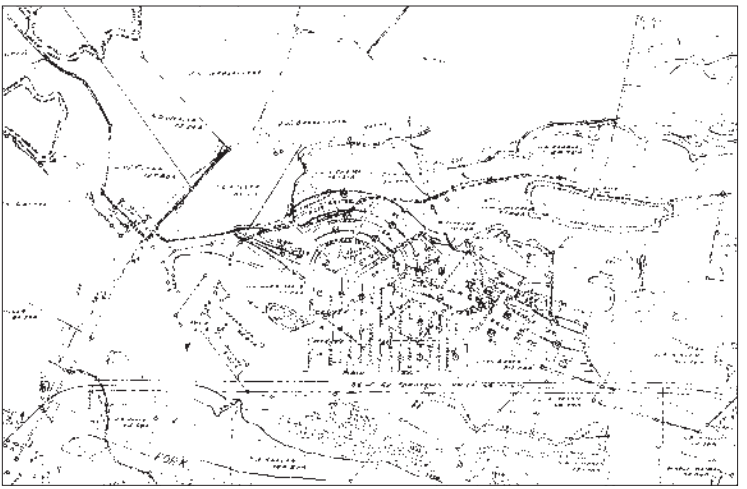


Figure 14. Portion of the plan of Kingsport, Tennessee, showing the streets as planned by the railroad's civil engineers. It was Nolen's starting point. The map "Lands Purchased by the Unaka Corporation" is a 1941 copy of the 1906 original. *Kingsport Library and Archive.*

National Housing Association; his office was just up Broad Street from Blair and Co., and he moved in the same social circles as Dennis. That Mackenzie may have wanted to do the town planning himself is indicated by an idealized plan bearing a striking resemblance to Kingsport, which he illustrated in his book *Industrial Housing* (Fig. 15); but he and Nolen became friends and collaborated effectively on Kingsport and again in Mariemont, Ohio.

Nolen did his best to correct the many errors in street arrangement and land subdivision created by Dunlap's awkward plans, but certain changes were impossible because some lots had already been platted and sold. The superiority of his new street plan can be seen in the resolution of problematic street intersections, but more vividly in development areas 2, 3, and 4 (*NTFO,* p. 53). Nolen ingen-

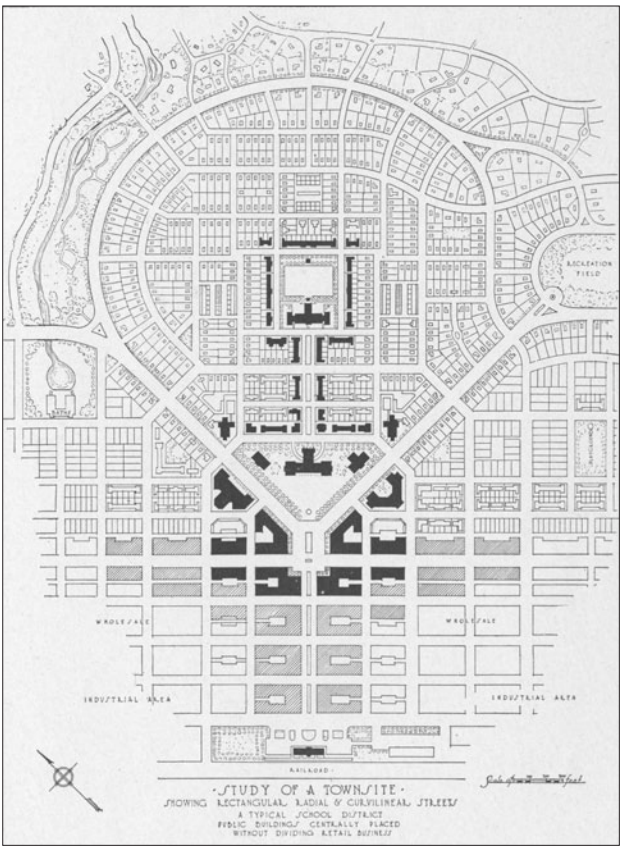


Figure 15. An idealized plan published by Clinton Mackenzie in *Industrial Housing* (1920), which coincides closely with the circumstances at Kingsport. Nolen and Mackenzie exchanged sketches to work out building locations and street intersections.

iously exploited the topography to arrange two of these housing developments around small hilltop parks, and the third on level ground southeast of the town center. The houses in development 2, known as the Fifties, were de-

signed by Mackenzie, whose tentative command of the English Tudor style was defeated by the difficult terrain. Mackenzie was the architect for many other buildings in town including the train station and the Kingsport Inn; these and his attached houses along Shelby Street were more successfully composed. Nolen was called on to collaborate with others too. Grosvenor Atterbury, another well-born New York housing expert, produced the finest ensemble in the city. Called White City because of the color of its clapboard houses, it surrounded Nolen's lozenge-shaped hilltop park adjacent to the high school (development 3). Both the planner and the architect exploited the topography to produce a group of handsome, deceptively simple houses with intricate multilevel plans. On the ridge above this group were more elaborate individual houses along Wautauga Street, and farther down the hill, in the area known as Little White City, were smaller, lower-cost houses by Mackenzie and Evarts Tracy, built to complete the neighborhood.[93] The coincidence of social and topographical hierarchy is striking—the workers' neighborhood was near the factories in the valley bottom, and each higher tier of land was occupied by a more prosperous group of residents. Separated from the rest was development 4, which was eventually planned as Armstrong Village, a neighborhood designed for the ideal accommodation of the prevailing indecency of racial segregation.[94]

Other buildings were designed by Atterbury, Tracy, and Electus Litchfield, a veteran of the architectural firm Carrère and Hastings. Thomas Hastings himself (whom Dennis referred to familiarly as Tommy) designed a civic center plan that was only partially executed; it ignored Nolen's civic center scheme, which included a two-block park (*NTFO,* p. 63). Hastings had designed the Blair and Co. building in Manhattan, two magnificent houses for C.

Ledyard Blair, and several projects for Ryan, and evidently the investors preferred his plan, which did not require them to forego the profits on the sale of two valuable city blocks as Nolen's would have.

Nolen shuttled his talented young associate, Earle S. Draper, between Kingsport and Myers Park in Charlotte, trying to keep a foot on the ground as both projects moved swiftly ahead. Draper, recognizing the opportunity presented by Nolen's preoccupation, cultivated Johnson in Kingsport and George Stephens in Charlotte, and in 1917 he left the Nolen office to start his own practice in Charlotte. (Later he returned to Kingsport to design the Fairacres section.) When tree planting at Kingsport became a repeated problem (there were no nurseries in the remote hollows of eastern Tennessee), John B. Dennis on his own hired Lola Anderson, an experienced landscape architect who had studied at Cornell and had worked in Draper's Charlotte office for a time. She stayed on in Kingsport and eventually rescued Dennis from the bachelor's life he had led for sixty-two years. Nolen befriended Anderson, but his tenuous control over so many aspects of Kingsport's design frustrated several of his efforts.

The design of Kingsport involved many actors with different and, at times, incompatible goals. For Dennis the point of Kingsport was the unique integration of efficient resource exploitation and interlocking ownership. In pursuit of these ends, he, Ryan, and others added to their interests in coal, real estate, and the railroad with investments in a local brick company, a cement company, a textile mill, a vast printing company, and other industries.[95] Ultimately Dennis was successful in attracting established outside corporations such as Mead and Eastman Kodak, a paternalistic company that eventually came to dominate his new industrial city. For him, city building was a management

problem. He sought expert advice to create the most up-to-date government structure, school system, and insurance program. Nolen's work was just one aspect of the project where the business plan, not the city plan, was of overriding importance. Kingsport was the "city practical" at its most utilitarian level; the local labor force was merely another resource to be efficiently managed, and results could be quantified on a profit-and-loss statement.

During Nolen's involvement in the project, a savings and loan society was established, modeled on a similar institution in Charlotte;[96] both cities took a lesson from his essay "A Good Home for Every Wage Earner." His broad view of the planner's role encompassed Kingsport's social and economic innovations, many of the kind he had long championed, but the physical aspects of the plan were less successful. Land set aside for parks proved too tempting and valuable, and most of it was eventually platted and sold, undermining Nolen's efforts to use park land to structure the city.[97] Still, confident that everything was better with planning, forethought, and cooperation, Nolen, always the enthusiastic collaborator, emphasized the advantages of this experiment in industrial efficiency. But his goals of social cooperation, civic order, and physical integration of city and landscape were not always compatible with Johnson's zeal for real estate sales or Dennis's drive to maximize railroad traffic and resource exploitation. The unearned increment of profit stayed in the hands of the investors.

Kistler

Kistler was an employer-sponsored town built by the Mount Union Refractory Company to provide housing for its workers just across the Juniata River from its factory on

the outskirts of Mount Union, Pennsylvania (Fig. 16). The region was a center for the production of fireproof refractory ceramic materials, which were used in steel manufacturing and other industrial processes where resistance to high temperatures was required. The necessary raw materials, ganister rock and silica clay, were plentiful in the region, as was coal, which was brought to Mount Union on narrow-gauge railroads for local use or transferred to the Pennsylvania Railroad for shipment elsewhere. The combination of rail transportation and natural resources made Mount Union an ideal location for this specialized industry. The plant was opened in 1912 and run by R. P. M. Davis and Clinton V. Hackman, a veteran of Harbison-Walker, one of the town's older refractory producers.[98]

As steel production accelerated around the turn of the century, so did the demand for refractory brick, which was

Figure 16. The Mount Union Refractory plant, in Pennsylvania, viewed from the site of Kistler. *Nolen Papers, Cornell University Library.*

often made in special shapes to fit particular applications. It was a labor-intensive industry that required workers with skill and experience. Some plants relied on local workers, but demand for labor in the growing industries of Mount Union outstripped supply in the thinly settled valley, so workers were recruited from elsewhere to fill the gap. Most of the region's refractory producers provided some form of housing for their workers, which varied in quality and arrangement depending on whether the factories were near existing neighborhoods or open land.[99]

Mills and mines were often the sites of town-planning experiments in the nineteenth century as remote mineral deposits or hydraulic power necessitated concentrated workforces in undeveloped locations. Workers in these industries were usually paid very little, making it impossible for them to afford decent houses, and employers found it necessary to provide housing to attract them to remote locations, or to keep them there.[100] Labor shortages and labor unrest eventually persuaded industrialists of the advantages of improved conditions for workers, and by 1920 there was a well-developed literature dealing with the techniques of industrial housing. These books and articles outlined practices of particular regions and industries and dealt with such issues as costs, construction methods, and engineering techniques. Housing of workingmen was presented as a "problem" with a scientific "solution."[101]

Whatever the motivation, industrial housing projects provided planners with the opportunity—and the control—to demonstrate the efficiency of the planning methods they advocated, an efficiency that could be measured by retention of workers, increased company profits, and sometimes by the newly developed yardsticks of sociology. Nolen worked repeatedly on company-sponsored town plans and housing for workers, but Kistler is especially notable for its

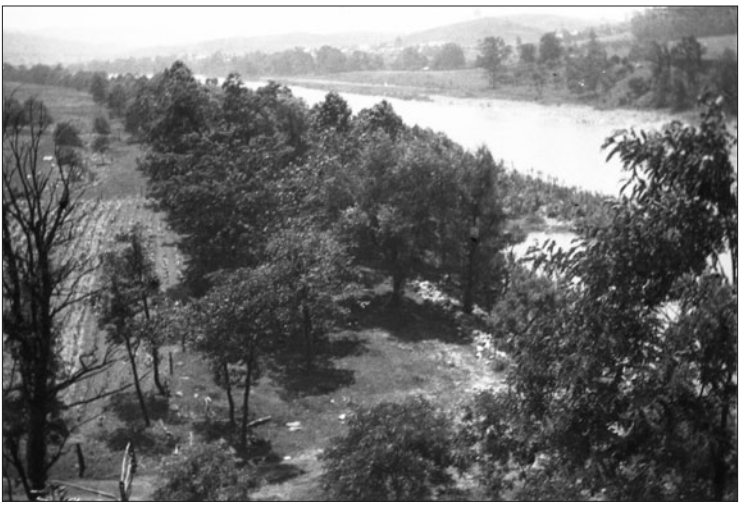


Figure 17. Kistler's riverbank site viewed from the railroad above it. This photograph was taken before construction work began. *Nolen Papers, Cornell University Library.*

lovely riverside site (Fig. 17) and for the striking contrast it presents to the region's grim coal mining towns.

Mining towns often had the appearance of utilitarian military encampments—simple rows of wooden barracks and boxlike houses deployed across the complex topography in a senseless grid. They were self-contained settlements with the most minimal provision for anything beyond the basic needs of the workers. At Kistler, Nolen aspired to a higher standard, incorporating many of the features of the best industrial housing practices of the region and combining them with ideas from English company towns such as Saltaire and Port Sunlight and American ones such as Pullman, outside Chicago. He provided numerous sites for civic buildings and shared activities, emphasizing Kistler's intended character as a community

rather than an encampment. An unusually large area was given over to parks, in part to deal with the floodplain of the river, though the result was a rather dispersed spatial organization that was exacerbated by the company's failure to complete many aspects of the plan. A community hall—really just a remodeled barn—was brilliantly integrated into the plan; it commanded the bluff above the river on one side and the elliptical town green on the other (*NTFO,* facing p. 70). Another public building, which served as both a company store and a school, was built in the location proposed by Nolen, but it did not follow the semicircular configuration on his plan. Rental housing was designed by Mann and McNeille of New York, with whom Nolen had worked in Walpole. There were some attached houses, but most were built for single families, and they included porches and indoor plumbing.[102] These were arranged along small street grids, which were carefully adjusted to the complex topography of the riverbank site.

Nolen's description of the town is notable for the paternalistic attitude he ascribes to his client, the Mount Union Refractory Company, whose role was to provide not only an attractive physical setting but one that engendered social life and good citizenship. His explicit concern was that "the population being so largely foreign in its make-up, there is a distinct necessity for a lead to be given in the direction of Americanism" (*NTFO*, p. 73). (The houses were labeled "Double Capri Villa," "Vermont Farm House," "Norman Cottage," in an unintentional allegory of assimilation.) Concern with foreign workers also comes up in discussions of Walpole, Mariemont, and Kingsport, indicating how troubling the domestic habits of impoverished newcomers were to third-generation Americans such as Nolen, or old Yankees such as Baxter. They hoped that an improved physical environment would lead to the develop-

ment of good American citizens, but they also recognized the need to supplement the positive effects of decent housing and town planning with social work.[103]

As the growth of the steel industry slowed, the demand for refractory materials eased and the urgency of the housing problem eased with it. The diminished need for company involvement in worker housing led to the sale of the individual houses in the 1940s, and after a series of industry consolidations the Mount Union Refractory plant was closed and demolished in the early 1990s. Nolen's town had outlived its reason for being. Along the way the Works Progress Administration had built a small school where the barn had been, but it was destroyed by fire. The stores were demolished in 1990. All that is left of Kistler are its houses and some of its carefully arranged streets. It is no longer connected to the industry that spawned it, and it is no longer really a village.

Cohasset

On December 21, 1911, John Nolen delivered an illustrated address to the Cohasset Men's Club on the subject of town planning. The club's stated object was "to add to the pleasure of its members and join their individual interest into active co-operation for the good of the town. It is not political or partisan or prejudiced. It aims to lend its assistance to good town government and to progressive ideas."[104] This organization and hundreds like it were the embodiment of the village improvement movement that took root in the last third of the nineteenth century, and as these voluntary civic revivals advanced beyond tree planting and cosmetic improvements, they sought professional guidance from experts such as Nolen. But Cohasset was different from many Nolen projects; it was a small prosperous vil-

lage in Massachusetts, relatively untroubled by industrialization, immigration, and other forces that were causing tumultuous changes in the cities. It already had a magnificent coastal landscape, a good government, and one of New England's most beautiful town greens, yet the enthusiasms of the era led citizens to seek progress toward a still better and a more beautiful place to live. To that end they engaged Nolen to produce a planning report, which he submitted in October 1912.[105] This was followed up with other studies in 1919 and 1920.

Nolen, as much as any of the American planners of his generation, came to his career with a desire to improve the conditions of workingmen, but his emphasis on the "city practical" did not exclude a concern for civic beauty. Cohasset is a case in point. A charming seaside town founded in 1670, it had evolved into a summer colony and distant Boston suburb. It is just the sort of place that Baxter wrote about in the first section of the book,[106] and Nolen's interventions demonstrate how much he was able to do when presented with an opportunity rich in architectural and natural resources. This was purely a replanning project, with no housing component and no attempt to uplift the poor or Americanize the foreign-born—rather a careful adjustment of parks, beaches, and streets to the new realities of trains, automobiles, and seasonal residents.

Though the dredging of the harbor was funded in part by the state, the other improvements were largely accomplished through voluntary subscription or contributions of land by individuals. The town was lucky to have residents with sufficient wealth and public spirit to accomplish many of Nolen's suggestions, and he comments on the remarkable voluntary civic culture that characterized such stable homogeneous American towns of his era.

Dr. Oliver Howe was the moving force behind the work

at Cohasset. His long, thorough letters to Nolen, with their small, craggy script, reveal his active interests in the morphology of New England towns and his keen attention to the civic life of Cohasset. By 1920 he was so thoroughly converted to the gospel of city planning that he tried some preaching of his own in two articles for *American Architect*, and in 1926 he wrote "Stumbling Blocks to Civic Planning" for the *Modern City*.[107] He contributed to the local newspaper too, describing the activities of the Cohasset Improvement Association, which had grown out of the encounter between Nolen and the Men's Club: "It will . . . strive to cultivate the community spirit—that constant desire of the individual for the welfare of the whole community. Thus and thus only, can we have a town worthy of our best living; and thus only can we so live as to be worthy of our town."[108] Howe lived in Cohasset, but seasonal residents such as the Bostonian Charles W. Gammons were active in the town's civic affairs too, and they were aided by other wealthy summer colonists including Mrs. Hugh Bancroft, heir to the fortune her stepfather Clarence Barron had made at the *Wall Street Journal.* She donated land for a bird sanctuary and a carillon for the beautiful if stylistically incongruous Gothic Revival church that Ralph Adams Cram had designed to grow from a rock outcropping at the periphery of the town green.

Nolen consulted on everything from curb details, street widening, and park planning to the acquisition of English bells for the carillon. By the spring of 1917 Howe was able to describe three major achievements: acquisition of Sandy Beach, acquisition of Whitney Woods, and the removal of the St. John stores from the edge of the town common. Nolen uses before-and-after photographs (*NTFO,* facing p. 81) to illustrate the improved connection between the colonial village green and the Cram church, which resulted

from the St. John stores' demolition. This improvement required good timing and a consensus that included the citizens, who paid for the demolished buildings, and also the owner of the buildings, who, though he was retiring, could have obstructed the project by simply refusing to sell the prime commercial location. Similar good results were achieved in the vicinity of the rail station, where stable barns were removed to present a better view of the church tower to arriving visitor (Figs. 18–20).[109]

Nolen chided the town in his planning report for its failure to heed the 1892 Trustees of Public Reservations report calling for the preservation of open spaces, and he recommended specific locations for acquisition as parkland. Sandy Beach was one of them, and though he would have preferred to have it acquired by a public authority rather than a private association, he was happy that it was preserved for communal use, hoping it would eventually be made into a public park. He proudly illustrates the bath

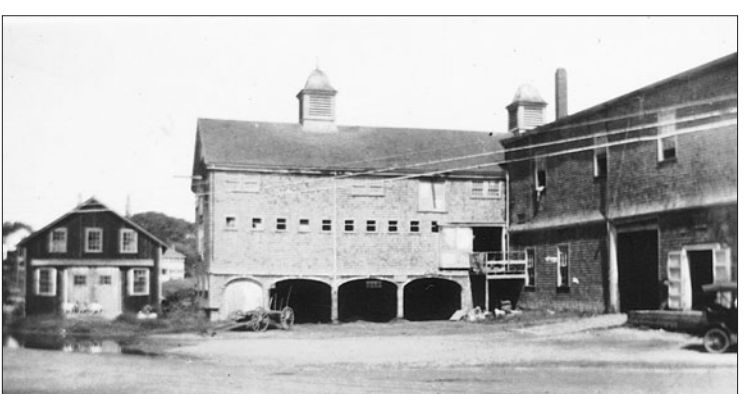


Figure 18. The train station was a primary gateway to Cohasset, Massachusetts, and the Tilden stables pictured here were just across the street. Once they were acquired and demolished Nolen designed a small park for the site. *Cohasset Historical Society.*

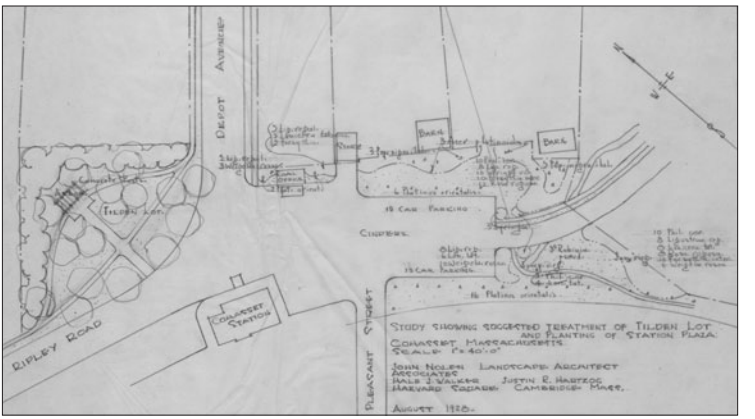


Figure 19. The park plan Nolen developed for the site of the Tilden stables. Removal of the stables opened an oblique view to the Gothic-style tower of St. Stephen's Church. *Nolen Papers, Cornell University Library.*

Figure 20. Nolen's plan for the area around the Cohasset Station. The trees structure the space and conceal the barns and the backs of buildings. His plan was not adopted, and this area remains as a poorly arranged parking lot. *Nolen Papers, Cornell University Library.*

house, neatly tucked in below a bluff, which replaced the ad hoc chaos of private cabanas that had proliferated when the land was in private hands (*NTFO*, facing p. 83).

Nolen had not specifically recommended the acquisition of the Whitney Woods near Turkey Hill, the high ground that separated Cohasset from Hingham. But in the wake of his report, this land was purchased by Whitney Woods Associates, another public-spirited private association, which turned some of the land into a golf course and used the remainder for riding and wilderness paths. These six hundred acres of land were donated to the Trustees of Public Reservations in 1933, and perhaps some part of the idea may be traced to Nolen's urgent pleas for preservation of "rock-bound hills," and his reiteration of similar Trust recommendations for hilltop preservation.

A more complex proposal for public land involved the acquisition of the verdant salt marsh around which the town had grown. Nolen wanted to fill the marsh and use it for active recreation while channeling the tidal stream that drained it—and evidently some of the town's sewage too. Nolen thought the town needed playing fields and playgrounds, and he lived in an era when wetlands were seen as something to be drained rather than preserved. He illustrates his proposal (*NTFO,* p. 84), but the need to acquire the backyards of so many different properties insured the failure of this idea. It is one instance where his ideas were better off on paper.

The relative ease with which some of these crucial beautification and land preservation projects were accomplished served to reinforce Nolen's notion that more could be accomplished in the planning of small towns than in large ones, but it also demonstrated what was possible with wealth, social cohesion, and voluntary civic spirit. Government-sponsored planning was a tougher thing to achieve in

the self-reliant civic culture of Cohasset. Building codes and planning ordinances were repeatedly defeated in the town meetings, and the town went without a zoning ordinance until 1955.[110] Even today nothing has been done to place ugly power lines underground, a measure recommended in Nolen's 1912 report. Still, the forward-looking actions of Cohasset's civic leaders and its early planner helped renew its center and protect its edges, a restructuring that allowed it to gracefully adapt to the changes of the twentieth century.

Union Park Gardens

When the United States entered the Great War, ideas about the role of the state in local planning efforts that had preoccupied Nolen and his Wharton mentors took on a new urgency. Constitutional niceties were, at least temporarily, overlooked as the nation mobilized for war. Two ambiguously public corporate entities were formed: the Emergency Fleet Corporation, which dealt with the needs of the shipbuilding industry, and the United States Housing Corporation, which dealt specifically with housing the influx of workers needed to produce matèriel for the war. The housing program of the Fleet Corporation got started earlier than the larger, more deliberately organized work of the Housing Corporation, whose planning department was headed by Olmsted Jr. The projects of both corporations were concentrated around shipyards and factories essential to the war effort. Nolen's long study of housing and planning prepared him as well as anyone for these unprecedented government programs, and he worked for both corporations, which drew together the talent and expertise in planning and housing that had been developing in the United States for decades. The German war suddenly freed planners of the ponderous constraints ordinarily imposed

by the layered sovereignty of the American governmental system, enabling them finally to experiment with the German planning methods they had studied so carefully.[111] Nolen worked on sites in Niagara Falls, New York, and in Eddystone and Ridley Park, Pennsylvania, for the Housing Corporation and in Wilmington, Delaware, for the Fleet Corporation.

Nolen was familiar with Wilmington from his work on Overlook Colony for the General Chemical Corporation on the other side of town near the Pennsylvania state line (*NTFO,* p. 5). He had played a central role there on prewar housing for workingmen, as he did in Bridgeport, Connecticut. For Union Park Gardens, leaders in the chamber of commerce formed the Wilmington Housing Company through a sale of stock, and the money raised was then used to buy land that was given to the federal government. Loans and financial arrangements between Liberty Land Company (the operating company) and the government resulted in a complex partnership between the U.S. Fleet Corporation and the Wilmington business community, whose shared goal was the construction of housing. Liberty Land Company was to manage the project once it was finished, opting out of a briefly contemplated cooperative ownership arrangement modeled on the English garden city and renting the houses at market rates.[112]

Union Park Gardens was located just beyond Wilmington's street grid and partially beyond the city limits, but the trolley extended there and the industrial area around the river was easily accessible. Nolen was particularly pleased that the adjacent property, across Union Street and Lancaster Avenue, was made part of the project, enabling him to control the planning of both sides of the surrounding major streets. The architecture was designed by Ballinger and Perot, a Philadelphia firm that had also worked in nearby

Marcus Hook, Pennsylvania; they designed an apartment building, individual houses, and groups of attached houses, all combined in the manner of earlier English garden cities and arranged on varied, irregularly shaped blocks. Land on the interior of several blocks was planned for allotment gardens, with the proviso that they be used for garages, if the need arose (and it did). Land was reserved for a community building and a school, but these were never built; the neighborhood stores on Union and Lancaster are the only nonresidential part of the project that was completed.

The landscape was the principal organizing element, and Nolen used the course of a small creek to determine the street arrangement. The plan (*NTFO,* p. 92) also shows the creek forming a variety of water features as it ran along the gently sloping terrain, but this aspect of the project was not realized; the creek bed was filled in and covered with lawn. Still, the departure from both the rigid street pattern and the relentless mid-Atlantic row houses of the adjacent area sets Union Park Gardens apart. Nolen's design allowed the taut geometry of the city to relax into the easier, topographically determined curve of the park. This subtle shift from straight to curved streets formed a graceful transition from the geometric, urban order to the irregular forms of the woodland park beyond; it was a clever bit of composition that allowed Union Park Gardens to stand alone as a neighborhood enclave, while integrating the surrounding area into an artful urban sequence. Housing density also becomes sparser and more irregularly planned as the parkway blends into the park, enhancing, quite explicitly, the transition from the city to the country.

Once the American troops were trained, transported, and deployed on the European front, the war was brought to a speedy conclusion, and Congress hastened to dismantle the corporations that had sponsored the war housing ef-

fort.[113] Many projects were sold off in a partially completed state. Union Park Gardens is one of the few that were brought nearly to completion, lacking only the civic buildings, and its houses, too, were sold to willing tenants or other buyers. For the most part Union Park Gardens remains as it was designed, disrupted only by subsequent construction in the park, which has subverted the larger aims of Nolen's urban aesthetics. The neighborhood's well-defined center and edges, combined with its distinctive architecture, continue to demonstrate the long-lasting benefits of careful collaboration among planners, architects, civic groups, and government.

Myers Park

The Charlotte Park and Tree Commission had been one of Nolen's first clients, and its secretary, George Stephens, proved to be one of his most steadfast supporters. Nolen had designed the grounds of Stephens's residence, and Stephens had persuaded many of his friends to commission Nolen to design theirs as well. As textile mills and other forms of industrialization proliferated in the "New South," Charlotte prospered. The energetic Stephens, a University of North Carolina football star who invented the forward pass, was also an innovator in the sale of real estate. He subdivided land for sale as residential lots around the Nolen-designed Independence Park, and as the city kept growing and property farther out became accessible by trolley, he hatched a larger development scheme called Myers Park.[114]

The land for Myers Park belonged to John S. Myers. During the time that he and Stephens were planning to turn it to more profitable use, Stephens married Myers's daughter Sophie. Consequently, Stephens was able to arrange to pay his father-in-law after the land was subdivided and

sold. Undoubtedly this made it easier to finance the high-quality roads, sewers, and other improvements that were needed to turn the old farm fields into Charlotte's premier residential suburb. Nolen first worked on the plan in 1911, and construction began in 1912. The project's one-acre lots were each within two blocks of a broad boulevard loop and the trolley, which ran down a center esplanade as it wound through the property. Though the trolley loop was never fully completed, it was viewed as essential and service was, at least at the start, subsidized by Stephens. A site for Queens College was planned at the center of the project, and sites were also designated for churches and civic buildings, as well as a small commercial center along Providence Road, which was planned but never built. The plan was arranged to allow for the protection of Sugar Creek lying west of the property, which Nolen later proposed as part of a city park system, and other small parks were interspersed to preserve ravines and other features such as the site of the old Myers house.[115]

George Stephens had a clear understanding of the importance of social position as a determining factor in real estate values, so he exulted when the tobacco and electric power tycoon James B. Duke bought a house and nearly an entire block to accommodate his garden.[116] Stephens built his own house near the topographical high point of the site a few years later. Nolen's office designed the grounds for many of the early houses, and to handle this business Nolen sent his young associate Earle S. Draper to Charlotte to provide on-site services. Trees were an important element, both of the individual properties and as a means to define the arboreal urbanism of the broad trolley boulevard. Extraordinary efforts were made to transplant large ones to quickly overcome the rawness of the empty cotton fields. They played a crucial role in the design of street sections,

where Nolen carefully integrated trees, planting margins, and sidewalks, calibrating them to different street widths to reinforce a spatial hierarchy among principal and secondary thoroughfares.

As the Myers Park work went along, the Charlotte Chamber of Commerce contemplated commissioning a city plan. After Nolen resisted requests for unpaid visits to discuss the matter, they invited him to speak at their annual dinner in February 1916, evidently hoping his evangelizing rhetoric would inspire interest in the planning project. Shortly after Nolen agreed to the date, John B. Dennis contacted him about the Kingsport project. Nolen tried to convince Dennis to adjust the scheduled Kingsport trip to accommodate the previously arranged Charlotte speaking engagement, but to no avail. Nolen had to cancel the Charlotte appearance (after the invitations had been made) so that he could visit the Kingsport site with Dennis and get back to his office to meet the tight deadlines of the very promising client. All of this got him off to a bad start with the Charlotte Chamber of Commerce. Eventually Nolen rescheduled his speech, and after more delay the chamber hired him to do a plan; the contract was finally signed in February 1917. In the midst of these complications, Draper, who later in his life emphasized his own importance by diminishing the role played by Nolen in almost everything, had established a relationship with Stephens that led him to leave Nolen's employ.[117] Stephens then hired Draper to complete the work on Myers Park. Stephens handled this situation gently and with great tact; both he and Nolen recognized that a public, professional separation would allow Nolen (in appearance and in fact) to assume a more even-handed role in his planning effort for the Charlotte Chamber of Commerce.[118]

The city plan committee made the awkward choice of

Earle Draper as its secretary, and then Nolen foolishly hired him on an independent basis to produce the city survey that was to form the basis of his planning effort. This tense arrangement came to grief when Nolen found Draper's survey work completely unsatisfactory, and after telling Draper so in a letter listing its deficiencies, he lost no time in telling the committee too. Ugly correspondence flew back and forth, the committee backed Draper, and Nolen was forced to make do with a survey he found unacceptable. As work progressed, the chamber was slow to pay Nolen, leading to further friction and more unpleasant correspondence, and requiring the intercession of Stephens. A plan was finally submitted in March 1918, but by then the leadership of the chamber was changing and everyone's attention was on the European war.[119] Nolen's Charlotte plan went no further.

All through this process Stephens was Nolen's steadfast friend, and evidently also he grew frustrated with Charlotte and its leaders. After buying a half interest in the Asheville, North Carolina, newspaper, he redirected his energy there (in October 1919 he wrote to Nolen about doing a plan for Asheville).[120] Draper, who was later head planner for the TVA, continued with work at Myers Park and opened an office in Charlotte. He made significant modifications to the parts of Nolen's plan that had not been implemented, smoothing out the street curves and redividing some blocks to provide more lots (Fig. 21). These changes reflect the fact that the trolley loop was being superseded by the automobile; Draper's smooth curves accommodate the car's greater speed, but his design lacks the finer-scale topographic sensitivity of Nolen's original plan (*NTFO,* p. 102).

The difference between Nolen and Draper is evident in the earlier and later plans, and other instructive planning comparisons abound in Charlotte. Draper's preference for

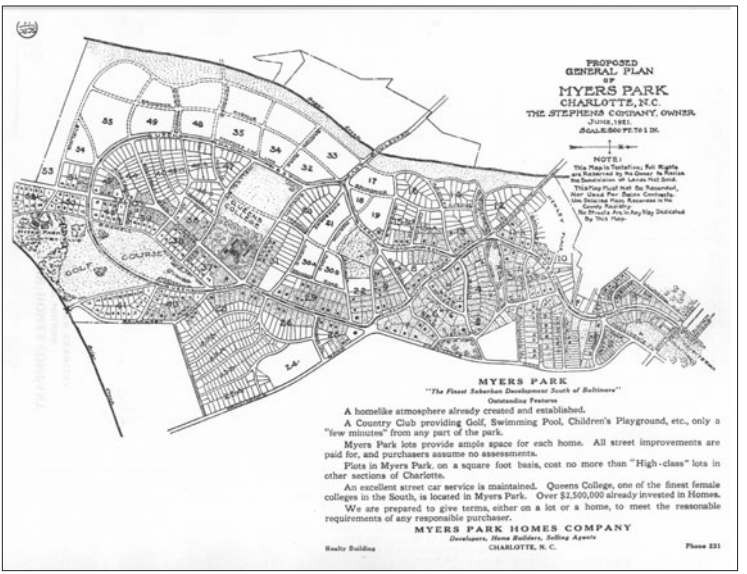


Figure 21. Myers Park, Charlotte, North Carolina, sales map from June 1921. Comparison with Nolen's map of the same property on p. 102 of *NTFO* shows the smaller lots and smoother curves made by Earle S. Draper after he took over planning there. *Myers Park Foundation.*

wide streets and sweeping curves can be seen at Eastover, a land subdivision across Providence Road that he designed on his own. Several blocks away in Dilworth, the Olmsted office produced another planned suburb. That project was hastily proposed just as Olmsted Jr. was leaving on his wedding trip, and the work was largely handled by Percival Gallagher.[121] A simple, well-designed plan, it lacks the idiosyncratic topographical accommodation of Myers Park and seems a bit formulaic, though plainly informed by the long experience of the Olmsteds in street design and salable lot standards. In this case Nolen had found the better client, and he produced a project whose distinc-

tive combination of intricacy and grandeur still makes Myers Park, in its intact older sections, one of America's great residential suburbs.

Mariemont

Philanthropy was one response to the degraded urban living conditions in crowded, newly industrialized cities. Unfortunately the magnitude of the problem was such that subsidizing the construction of housing or paying directly for it quickly found the bottom of even very deep pockets. Consequently, projects large and small were often attempted as models of what might or should be done. For example, Jacob Schmidlapp's Cincinnati Model Homes Corporation, a limited-dividend corporation, built decent housing for wage earners in downtown Cincinnati while voluntarily limiting its profits (an approach that had many precursors in England and larger East Coast cities). If the speculator's unearned increment of profit was a cause of the housing problem, limiting profits from rent and real estate sales was one logical solution.

Mariemont, Ohio, was a demonstration project on a much grander scale, comparable to examples farther afield such as Forest Hills Gardens in New York and Hampstead Garden Suburb in London. Funded with the immense fortune that Mary Emery had inherited from her husband, Thomas, a Cincinnati candle manufacturer and real estate investor, Mariemont was named for the couple's summer estate in Newport. Nearly all aspects of the project were under the control of Mrs. Emery's adviser, Charles J. Livingood, a Harvard classmate of the Emerys' late son. With her authorization, Livingood had traveled widely to study city planning examples in the United States and abroad,[122] and he began quietly assembling land for the project outside Cincinnati before the Great War. Acting as agent for

Mrs. Emery, he remained deeply involved in the process throughout and worked directly with Nolen's office to create a remarkable garden suburb, perhaps Nolen's greatest built project.

Writing in 1927, Livingood explained to Nolen that he had chosen him for Mariemont because of "the good impression you made at various conventions where I watched you closely. I selected you because of your sanity and strong character."[123] Nolen was absent when Livingood first came by his office in 1920 to discuss the project, so his associate Philip Foster handled the initial contact. Concerned that word of the project would complicate and add expense to land acquisitions, Livingood insisted that it remain secret for two years, until 1922, when Nolen made a carefully orchestrated presentation to the Cincinnati Commercial Club. Ground was broken in spring of 1923.[124]

Located on the outskirts of Cincinnati, Mariemont occupies a high bluff overlooking the Little Miami River valley. Originally the tentacles of the street rail system that stretched out along its northern side connected rental housing in the Dale Park section, intended for "wage earners," to nearby industrial areas. This quadrant of the plan was separated from the others by Dogwood Park, Dale Park, and the schoolyards (*NTFO,* facing pp. 119 and 125), which were strung along a ravine that deepens as it traverses southwest across the site. The other three quadrants of the plan accommodate individual houses on larger lots, more oriented to the automobile access of Wooster Pike and the main train line in the valley along the town's southern edge. This geographical separation of economic strata was reinforced by the Dale Park section's separate neighborhood commercial center (*NTFO,* facing p. 120) and only partially overcome by the unifying matrix of streets radiating from the octagonal town center. Such integration of social and geographical structure is characteristic of Nolen's plans, as

is the preservation of watersheds and ravines in parkland (*NTFO,* p. 122).

The north-to-south axis of this central street pattern connects the town center through a series of progressively narrower streets to a dramatic termination at an exedra with commanding views across the verdant river valley (Fig. 22). (This crucial connection has been weakened by subsequent construction.) Similarly, the perpendicular west-to-east axis, along the Wooster Pike, widens by small increments in its transit across the site until the planted esplanade separating its traffic lanes becomes a forested park. Both axial sequences rely more on tree trunks and canopies than on architecture to establish spatial order. Both also express quite literally the notion of the American garden city as a mediation between city and country. These intercon-

Figure 22. The Concourse, designed by Nolen's associate Philip Foster, is an exedra that overlooks the Little Miami River valley. It terminates the central north-south axis of Mariemont, Ohio. *Photograph by Charles D. Warren.*

nected social ideas and spatial sequences, even compromised as they are by incomplete or disruptive architecture, suggest the possibility that the landscape and the city might share the artistic structure of the garden, and that, in Nolen's words, "art is used for life's sake, and life is recognized as art."[125]

The plan shares many elements with other garden city plans of the period, such as those at Letchworth and Welwyn (*NTFO,* pp. 3 and 140). It has the usual geometric center, well defined by roads if not always by buildings; streets radiating in orthogonal and diagonal directions and gradually becoming more curvilinear to signal the transition to residential sections; and one axis that is given emphasis with a long park or esplanade on which prominent civic or commercial buildings are located. In Mariemont these features are adapted to accommodate the particular transportation circumstances and to enhance the dramatic river bluff site.

The garden city social program was also adapted to local circumstances. Though Livingood was a knowledgeable and sympathetic client who understood the social and economic ideas behind the garden city, he viewed Mariemont as a voluntary philanthropic enterprise, not a manifestation of fundamental social reform. He and Mrs. Emery did not waver from the generous implementation of their plans, but they controlled the unsold land and rental property, and so it continued as philanthropy only as long as they chose. (In 1931 Mariemont's assets were turned over to the Thomas J. Emery Memorial Trust, and the Dale Park apartments were sold in the 1950s.)[126] Communal or cooperative ownership, one of the defining characteristics of the garden city, was only vaguely contemplated and never instituted, though rents were kept affordable and profits were limited or never realized. But all of this was done without the so-

cial redefinition that a restructured system of ownership would have entailed.

Though Nolen suggested a list of architects to work on the buildings, Livingood had some ideas of his own, and evidently he enjoyed dispensing commissions to distinguished practitioners. Selections were carefully made so that each architect had control of a coherent group, and so that jarring juxtapositions of style would be avoided. Wanting the architecture to grow out of his designs, Nolen provided a color-coded plan to show Livingood how to group the commissions, emphasizing building pairs at street intersections and careful placement of buildings at vista terminations.[127] Existing architectural features are treated sympathetically; for example, a Georgian-style brick farmhouse on the property is flanked on one side by stylistically similar, if oddly horizontal, buildings by Richard H. Dana Jr. (*NTFO,* facing p. 121), and on the other by beautifully proportioned and ingeniously planned brick townhouses designed by Edmund B. Gilchrist (*NTFO,* facing p. 113). All three harmonize with Colonial-revival schools nearby (*NTFO,* facing p. 124) to form a stylistically coherent district. Many other groups are designed in English cottage styles, or Arts and Crafts adaptations of them, reflecting the English sources of the garden city. Among these, three ensembles designed by Grosvenor Atterbury, Robert R. McGoodwin, and the partners Lois Howe and Eleanor Manning (*NTFO,* facing p. 118) make particularly beautiful residential closes. The quality and variety of the architecture are key to the success of the northwest quadrant of the plan, which relies on enclosed allotment gardens to mitigate its dense building pattern. Even the less successful examples, such as an ungainly corner apartment building by Clinton Mackenzie, are well enough integrated with the whole that they are more idiosyncrasies than glaring flaws.

Nolen's chapter on Mariemont is based on a paper he

presented at the International Cities and Town Planning Conference held at Göteborg, Sweden, in summer of 1923. The conference was accompanied by an exhibition of planning projects including a huge collection of Nolen's, which was by far the largest in the show. The paper he delivered there and the Mariemont chapter in *NTFO* both focus on the early understanding by the management theorist Roger Babson (a client of Nolen's) of the planning and real estate implications of widespread automobile use in the United States, but the differences between the two pieces are telling. Well-intentioned though he was, Charles Livingood might not have wanted to read such sentences in the Göteborg paper as "We think it is necessary that Garden city enterprises should be under the control of bodies which have some connection to public authorities." Nolen tactfully revised the paper for publication, deemphasizing the necessity for state participation and highlighting the positive planning achievements in the United States.

Mariemont was one of the most elaborate and well-designed new towns of the era, but that was not sufficient for Nolen, who wanted the physical plan to be accompanied by economic reform. Years later he asserted that because of the lack of cooperative or public ownership "the United States has no 'garden city.'"[128] Nolen was willing to work within constraints that excluded restructured ownership, but he never could ignore his preferred, cooperative ideal.

FINAL CHAPTER

The bright future of Florida, where Nolen had a branch office in the late 1920s, weaves in and out of the optimistic text of his final chapter. To illustrate his busy practice there,

he features Venice, Florida (*NTFO,* facing p. 154), one of his most ambitious plans. His original client, the renowned orthopedic surgeon Dr. Fred Albee, had bought Nokomis and Bay Point in 1917. After he acquired the land for Venice, across Roberts Bay, in 1924, he wrote to Nolen for advice on planning the property. Nolen made plans for all three sites, and Albee used his Bay Point plan to sell individual lots, but in 1925 he sold the Venice property to the already shaky investment arm of the Brotherhood of Locomotive Engineers (BLE). The union wanted to solve its financial problems by making a quick profit in Florida real estate, and it piled one land deal upon another, acquiring a vast property of 30,000 acres stretching inland from the original coastal site.[129] At Albee's urging, the BLE continued to work with Nolen, who extended his plans to encompass agricultural lands devoted to dairies and five-to-ten-acre cooperative farmsteads as well as a separate town called Little Harlem, whose odious intent is evident from its name. (Nolen encouraged at least decent housing for African Americans, but he did not resist the shameful norms of the era that resulted in separate civic improvements conceived unequally, along with everything else.) The result of Nolen's effort was a plan of regional scope to fulfill the promise of leisure and prosperity in the sunny climate of the booming state (Fig. 23).

The end of *NTFO* is a forward-looking pendant to the previous chapters' discussion of New England planning traditions. The optimism of Roger Babson's prescient understanding of the complex changes brought on by automobiles, radio, and the increase in leisure time pervades the text. Not surprisingly, Nolen advocates planning by national and state governments, by industry and railroads, and by limited-dividend companies. His belief in the capacity of his profession to meet the challenges of the future was stronger than ever, and his zeal to expand its scope of action energizes his conclusion.

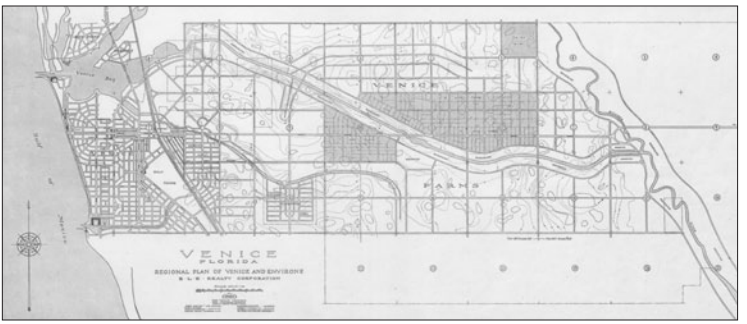


Figure 23. Nolen's regional plan for Venice, Florida, stretching to the Myaka River and including Nokomis, Bay Point, Little Harlem, and Venice Farms. *Nolen Papers, Cornell University Library.*

Five appendices were intended for the first edition of *NTFO*, but three were omitted.[130] Only the list of published American planning reports and a bibliography were included in the original edition. These provoked a scolding letter from Theodora Kimball Hubbard, the Harvard librarian and wife of Nolen's teacher Henry, who chided Nolen for including too many references to his own publications and found "the bibliography far below the standard of the text and illustrations of the book itself."[131] Others greeted the book more warmly. Ebenezer Howard wrote that it was a "Prophet of what is to come,"[132] and the *New York Times* noticed it positively as a "valuable little book . . . aimed at the general reader."[133] Thanks came from friends at home and abroad, most of whom had received the volume as a gift from Nolen (he bought five hundred copies and used them to promote his work, his ideas, and himself). Sylvester Baxter was given a vague acknowledgment at the front of the book, but he died in 1927 and may never have seen the finished volume.

New Towns for Old marks a high point in Nolen's eventful career. Shortly before it was finished, Nolen's long-time associate Philip Foster, intoxicated by the

Florida boom, set out on his own. His departure threw the Jacksonville office into turmoil, but it was a small problem compared to what was to follow.[134] As the Florida real estate bubble burst and the national economy came crashing down, so did Nolen's practice. By 1931 his office consisted of himself, his associate Justin Hartzog, and a secretary. Nolen kept busy, but not with work that paid anything. Once the federal government began spending on public works, he was able to participate as state planner for New Hampshire, and he served as special planning consultant at-large under the National Resources Planning Board and as a consultant on several National Park Service projects. He also served in various capacities at other agencies including the departments of Interior and Agriculture.[135] These were fitting roles for an elder statesman who had spent his career encouraging active government involvement in planning.

His practice, his writing, and his participation in planning organizations had made him one of the profession's international leaders, a status that took on new importance as the crisis of the Great Depression made policy makers more open to foreign planning ideas.[136] In 1931 he received a grant from the Oberlander Trust to study European waterfront improvements, and at the International Federation of Housing and Town Planning (IFHTP) that year he was elected president, making him the organization's third leader after Ebenezer Howard and Raymond Unwin. Nolen's broad background, combined with his interest in housing, land planning, and the garden city idea, gave him a kinship with the Europeans, and he was active in many European organizations and conferences, though IFHTP was his chief focus abroad.[137]

When Unwin visited the United States in October 1922, Nolen went to great lengths organizing the visit, and the

two men's cordiality soon grew into friendship. The Nolens befriended Unwin's daughter, who lived in the United States, and in 1923 their own daughter Barbara spent part of the summer living with the Unwins in Hampstead. Nolen returned the favor when Unwin's son Edward came to work in Nolen's office for a time in 1926. Nolen went to Europe in 1932, his twelfth trip, and again in 1935 for his IFHTP work, and Unwin came to the United States on a lecture tour in 1937. He was in New York when Barbara Nolen called to tell him that John was gravely ill. Immediately he wrote to his friend:

> You may at least have this consolation—beyond what is true for most—that you have lived your life to some purpose; that the value of your work in the pioneer period of planning over here is recognised and is most highly appreciated by those best qualified to assess it, not only in this country but in England and in many other lands where your leadership in the field is known, and where your genial and helpful personality have endeared you to a very wide circle. From that circle you will be greatly missed: the gap which your absence from it will create will be a sad one. For myself I cannot tell you how much I have valued your help, your experience, and above all your personal friendship . . . I wish to you . . . with all my heart as great a measure of courage as you may need, and of faith to believe that in some way beyond what we can realise all is part of a greater plan than we can yet see.[138]

John Nolen lived long enough to receive this tribute, and even managed to send a reply, but on February 18, 1937, he died at his home in Cambridge. Much was left un-

finished, including half-implemented plans for a second edition of *New Towns for Old*. In the end, only thirty-one copies of the second edition were produced, and these were cobbled together by rebinding new material with old.[139]

It is in the nature of town planning to start more than can be finished, but by the centenary of Nolen's Harvard graduation many of his goals had been achieved. The planning process had been institutionalized in most American cities with zoning and a professional planning bureaucracy, the states had adopted planning as a tool, and even the federal government had become involved, directly and indirectly, in housing, slum clearance, and transportation infrastructure, including the sprawling interstate highway system. The densely intertwined functions of the city had been decentralized and teased apart into discrete residential, commercial, and industrial sectors, and home ownership had reached historic highs through financing methods Nolen had long championed. But solutions to early-twentieth-century problems have created other, new problems, which now confront citizens and planners. The planning bureaucracy has a life of its own, and it sometimes mistakes clear process for clear goals. Many seek to reform the entrenched preoccupation with roads and parking and the bias against the density and mixtures of activities that make urban living enjoyable and convenient. Some act to mitigate the negative effects of the metastasizing highway system, which has replaced congestion of the population with congestion of the cars, and still others struggle to regain the civic culture that was lost in the dispersion of urban activities. Nolen recognized the need for constant revision of the city plan to cope with changing circumstances, and this was never more necessary than it is today.

It may be that the way forward can be found through study of the places he created rather than in the processes

he advocated. These towns and cities are his living legacy, where individuality has been established, distinctiveness preserved, and physical situation accented. The best of them are documented in *New Towns for Old,* and they illustrate the social and artistic balance John Nolen tried to negotiate between American culture and the American landscape.

NOTES

Research for this essay was funded in part by a grant from the John Nolen Research Fund, Cornell University Library. Elaine Engst and the staff of the Division of Rare and Manuscript Collections at Cornell made working there a pleasure, and I gratefully acknowledge their assistance. Tom Hanchett of the Levine Museum of the New South, Brian Wilson of the Kingsport Public Library, and David Smith of the New York Public Library each have provided indispensable guidance and help. Illustrations for the introduction and the cover were made possible by Evelyn and Michael Jefcoat, whose enthusiasm and support have added greatly to the project. I also wish to thank the Viburnum Foundation, whose forward-looking commitment to thoughtful land stewardship has made the new edition of this book possible.

NP = Nolen Papers, Cornell University Library
NYPL = New York Public Library

1. Sylvester Baxter, "A Great Civic Awakening in America: The Organized Instruments for the Creation and Preservation of Beauty in Public Places," *The Century* 64 (June 1902): 255–65; Jon A. Peterson, *The Birth of City Planning in the United States, 1841–1917* (Baltimore: John Hopkins University Press, 2003).

2. John Nolen, *Replanning Small Cities* (New York: Huebsch, 1912), 5.
3. John Loretz Hancock, "John Nolen and the American City Planning Movement: A History of Culture Change and Community Response, 1900–1940" (PhD diss., University of Pennsylvania, Philadelphia, 1964), 18. Hancock's dissertation is the indispensable guide to Nolen's career and its relation to the emergence of the American planning profession.
4. H. Morton Bodfish, ed., *History of Building and Loan in the United States* (Chicago: Building and Loan League, 1931), chaps. 3, 4; Joseph Sundheim, "Pennsylvania," in *History of Building and Loan*, ed. Bodfish, 547–58.
5. Lincoln Steffens, *The Shame of the Cities* (New York: McClure, Phillips and Co., 1907), 196.
6. Dorothy Gondos Beers, "The Centennial City: 1865–1876," in *Philadelphia: A Three-Hundred-Year History*, ed. Russel F. Weigley (New York: Norton, 1984), 438–39.
7. Harry C. Silcox, *Philadelphia Politics from the Ground Up: The Life of Irishman William McMullin, 1824–1901* (Philadelphia: Balch Institute Press, 1989), 72–73.
8. U.S. Bureau of the Census, 1870, Series M593, Roll 1407, p. 607, indicates that John Nolen lived in the 20th Ward, 68th District, but newspaper accounts repeatedly refer to the Buttonwood Street address. The Census also records the daughters, Stella, eleven years old, and Nettie, six years old, which makes it doubtful that the elder girl was the child of Matilda Nolen, who was only twenty-five.
9. See the following articles in the *Philadelphia Inquirer* of 1870: "Riot and Bloodshed," Oct. 14; "The Police Again," Oct. 14; "His Condition," Oct. 15; "The Law Against Carrying Concealed Weapons," Oct. 17; "The Arrest of William B. Mann," Oct. 18; "The Nolen Homicide," Oct. 18; "City Intelligence," Oct. 20; "City Intelligence," Oct. 24.
10. John Nolen Jr. and Barbara Nolen Strong, *The Nolen Family Album: A Record of Five Generations,* NP, 5.
11. Ibid.
12. Cheesman O. Herrick, *History of Girard College* (Philadelphia: Girard College, 1927), 81. Herrick worked with Nolen at the American Society

for the Extension of University Teaching prior to his appointment as president of Girard.

13. Steven A. Sass, *The Pragmatic Imagination: A History of the Wharton School, 1881–1981* (Philadelphia: University of Pennsylvania Press, 1982); Daniel T. Rodgers, *Atlantic Crossings: Social Politics in a Progressive Age* (Cambridge, Mass.: Harvard University Press, 1998), chap. 3.
14. Sass, *Pragmatic Imagination*, 57.
15. Ibid., 73.
16. For a thorough exploration of the relationship between German-trained economists and the development of American social reform, see Rodgers, *Atlantic Crossings.*
17. Sass, *Pragmatic Imagination,* 73–75.
18. John Nolen, "The Philadelphia Gas Works," in *The City Government of Philadelphia*, ed. Edmund J. James (Philadelphia: Wharton School, 1893).
19. "Catskill Cottage Life," *New York Times*, June 4, 1893; see also *NYT,* Sept. 1, 1893, July 15, 1894, and July 22, 1894.
20. Candace Wheeler, "Dream City," *Harper's Monthly* (May 1893): 830–47.
21. Nolen Jr. and Strong, *Nolen Family Album,* NP, 10.
22. Hancock, "John Nolen and the American City Planning Movement," 18.
23. Nolen Jr. and Strong, *Nolen Family Album,* NP, 11.
24. John Nolen, "Oxford Summer Meeting," *The Citizen* 5 (1895): 195.
25. John Nolen, *A Good Home for Every Wage Earner* (Washington, D.C.: American City Pamphlets, 1917); Bodfish, ed., *Building and Loan.* Building and loan societies in the United States started outside Philadelphia, and the city remained the center of this movement. The financial arrangements of these voluntary societies exemplified Nolen's notion of cooperation.
26. Hancock, "John Nolen and the American City Planning Movement," 24.
27. Under the direction of Max von Pettenkofer, "who made the science of public health a German one[,] Munich . . . became a model of salubrity." George R. Collins and Christiane Craseman Collins, *Camillo Sitte: The Birth of Modern City Planning* (New York: Rizzoli, 1986), 38.
28. Camillo Sitte, *City Planning According to Artistic Principles: A Contri-*

bution to the Solution of Modern Problems of Architecture and Monumental Sculpture Especially with Regard to the City of Vienna, trans. George R. Collins and Christiane Craseman Collins (New York: Random House, 1965). This is the best translation of Sitte's book, which was first published in 1889 as *Der Städtebau nach seinen künstlerischen Grundsätzen.* The Collins's translation is reprinted in their *Camillo Sitte*, 129–332.

29. Theodor Fischer, "City Building," trans. Sylvester Baxter, 1908, typescript in U.S. Library of Congress. According to Collins and Collins there is another copy at Harvard. For the significance of Fischer, Henrici, Sitte, and this phase of German planning, see Collins and Collins, *Camillo Sitte*.
30. Hancock, "John Nolen and the American City Planning Movement," 36, quoting a passage in a letter from Nolen to Barbara Nolen.
31. J. S. Pray, "The Department of Landscape Architecture at Harvard," *Landscape Architecture* 1 (Jan. 1911): 53.
32. Student records, Harvard University archives.
33. Susan L. Klaus, *A Modern Arcadia: Frederick Law Olmsted Jr. and the Plan for Forest Hills Gardens* (Amherst: Library of American Landscape History/University of Massachusetts Press, 2002), 170–71, n. 17.
34. Petersen, *Birth of City Planning*, 77–97.
35. Collins and Collins, *Camillo Sitte,* 114.
36. For the water supply as a precursor to the development of American city planning, see Petersen, *Birth of City Planning*, chap. 2. Nathan Hale Sr. (nephew of the martyred patriot) was a member of all water commissions from 1837 to 1846. He and his sons Nathan Jr. and Edward Everett, along with Charles Dunbar, Robert Morris Copeland, and Sylvester Baxter, were active advocates of metropolitan parks and planning. For Hale Sr. and the water commissions, see Nelson Manfred Blake, *Water for the Cities: A History of the Urban Water Supply in the U.S.* (Syracuse, N.Y.: Syracuse University Press, 1956). For Copeland's connection to the *Boston Daily Advertiser,* see Daniel J. Nadenicek and Lance M. Neckar, Introduction to H. W. S. Cleveland, *Landscape Architecture, as Applied to the Wants of the West* (1873; reprint, Amherst:

Library of American Landscape History/University of Massachusetts Press, 2002), xxxiii, n. 47. For E. E. Hale and metropolitan parks, see Cynthia Zaitzevsky, *Frederick Law Olmsted and the Boston Park System* (Cambridge, Mass.: Harvard University Press, 1982).

37. The Trustees of Public Reservations changed its name to The Trustees of Reservations in 1954.
38. "Massachusetts is acquiring public reservations . . . through the actions of state appointed commissions, like the Metropolitan Water Board and the Metropolitan Park Commission. . . . In this way the Metropolitan Parks and Parkways around Boston have been created and large reservations have been secured on the watershed of the Metropolitan Water Supply." Letter supporting state parks in John Nolen, *State Parks for Wisconsin* (Madison: State Park Board, 1909), 45–46.
39. Keith Morgan, "The Man Behind the Monograph," Introduction to Charles W. Eliot, *Charles Eliot: Landscape Architect* (1902; reprint, Amherst: Library of American Landscape History/University of Massachusetts Press, 1999), xi.
40. William de las Casas, one of the first Metropolitan Park commissioners and a Malden neighbor of Baxter's, identifies the genesis of the idea for the metropolitan parks system in Baxter's 1891 *Boston Herald* article "Greater Boston." See William B. de las Casas, "The Middlesex Fels," *New England Magazine* 24, no. 6 (Aug. 1898): 717. Baxter makes a similar, subtler claim in his *Boston Park Guide* (Boston: Pinkham Press, n.d.), 39. Keith Morgan also credits Baxter in "Man Behind the Monograph," xi.
41. For a thorough discussion of Boston's interconnected elite, see E. Digby Baltzell, *Puritan Boston and Quaker Philadelphia* (New Brunswick, N.J.: Transaction, 1996), chap. 14.
42. *National Cyclopaedia of American Biography* (New York: J. T. White and Co., 1893–1975), 419–20.
43. Mary Norton Kratt and Thomas W. Hanchett, *Legacy: The Myers Park Story* (Charlotte: Myers Park Foundation, 1986), 24.
44. John Nolen, "A Suburban Home for Six Thousand Dollars," *Country Life in America* (Aug. 1905): 425–26.

45. Frederick Law Olmsted Jr. and John Nolen, "The Normal Requirements of American Towns and Cities in Respect to Public Open Spaces," *Charities and the Commons* (Aug. 1906): 411–26. This magazine was edited by Edward T. Devine, Nolen's predecessor as secretary of ASEUT.
46. Lincoln Steffens, "Sending a State to College: What the University of Wisconsin Is Doing for Its People," *American Magazine* 67 (Feb. 1909): 349–64.
47. Hancock, "John Nolen and the American City Planning Movement," 231.
48. See John L. Hancock, *John Nolen, Landscape Architect, Town, City and Regional Planner: A Bibliographic Record of Achievement* (Ithaca, N.Y.: Program in Urban and Regional Studies, Cornell University, 1976), and Appendix in the present volume. See also Hancock, "John Nolen and the American Planning Movement," 157–230; Petersen, *Birth of City Planning*, 236–47.
49. Petersen, *Birth of City Planning*, chaps. 10, 11; Gregory Gilmartin, *Shaping the City* (New York: Clarkson Potter, 1999), 150–82.
50. Frederick Law Olmsted Jr., "Is an Increment Tax Feasible?" *Colliers*, Sept. 13, 1913, 6.
51. Frederick Law Olmsted Jr., "The Scope and Results of City Planning in Europe" (address to the National Conference on City Planning and Congestion of the Population, 61st Cong., 2nd sess., May 1990, Senate Doc. 442), 70.
52. For a complete account of Marsh and the Washington conference, see Peterson, *Birth of City Planning,* 236–42, 246–55.
53. Gilmartin, *Shaping the City,* 165, 168–70, 182.
54. Petersen, *Birth of City Planning,* chap. 11.
55. *Proceedings of the Second National Conference on City Planning and the Problem of Congestion, Rochester, New York, May 2–4, 1910* (Boston: The University Press, 1910), 11.
56. For the growth of building and loan societies, see Bodfish, ed., *Building and Loan*, chap. 4. For the difficulties of importing European social policy, see Rodgers, *Atlantic Crossings,* 200–2.

57. Anthony Sutcliffe, *Towards the Planned City: Germany, Britain, the United States and France, 1780–1914* (New York: St. Martin's Press, 1981), 94.
58. Nolen to John C. Olmsted, Sept. 16, 1915, NP, box 97.
59. Nolen ends the Reading chapter with an exhortation to the forces of good in the city. Funding to implement his plan, opposed by the powerful Reading Railroad, was defeated at the polls in 1910; evidently the city's growing Socialist Party also opposed it. For a thorough analysis, see Hancock, "John Nolen and the American City Planning Movement," chap. 6.
60. Werner Hegemann and Elbert Peets, *American Vitruvius: An Architects' Handbook of Civic Art* (New York: Architectural Book Publishing, 1922), 259.
61. Hancock, "John Nolen and the American City Planning Movement," chap. 4.
62. Petersen, *Birth of City Planning,* 314–15.
63. Nolen includes this definition in a footnote on p. 133, and he quotes it in slightly abridged form in John Nolen, "Garden Cities—United States," unpublished typescript, NP, box 30. It is the definition adopted by the Garden Cities and Town Planning Association in 1919, which appears in C. B. Purdom, "An Introductory Chapter," in *Town Theory and Practice*, ed. C. B. Purdom (London: Benn Brothers, 1926).
64. Robert Beevers, *The Garden City Utopia: A Critical Biography of Ebenezer Howard* (New York: St. Martin's Press, 1988), 28.
65. John Nolen, "Garden Cities—United States," NP, box 30.
66. Ibid.
67. Beevers, *Garden City Utopia,* 175.
68. Hancock, "John Nolen and the American City Planning Movement," 363–67; Rodgers, *Atlantic Crossings,* 352.
69. John Nolen, *The Planning of Cities, Towns and Villages, Outline of Lectures* (Washington, D.C.: Army Educational Commission, 1919); Frank E. Vandiver, *Black Jack: The Life and Times of John J. Pershing* (College Station: Texas A&M University Press, 1977), 1013.
70. The American City Bureau was founded by Edgar and Harold Butten-

heim, the publisher and editor of *American City Magazine*, respectively. It was started to organize the City Planning Exhibition at the New York Public Library in 1913, which traveled extensively to chambers of commerce and civic groups across the United States.

71. For the Baxter-Bellamy connection and the Nationalist Party, see Arthur Ernest Morgan, *Edward Bellamy* (New York: Columbia University Press, 1944), 94, 249, 291.
72. Baxter to Nolen, Feb. 8, 1922; Nolen to Baxter, Dec. 3, 1921, Mar. 19, 1923, and Dec. 24, 1926, NP, box 1.
73. Baxter material in NP, boxes 1, 101.
74. Nolen to Baxter, Oct. 27, 1921, NP, box 1.
75. Jones to Nolen, Aug. 17, 1926, NP, box 1.
76. Nolen to Shaw, Dec. 2, 1926, Shaw papers, NYPL, box 116. For background on the farm city projects, Elwood Mead's farm towns, and Shaw's connection to them, see Rodgers, *Atlantic Crossings*, 343–52.
77. See Shaw papers, NYPL, box 47. Baxter wrote a number of articles for Shaw's *Review of Reviews,* and the two corresponded on matters of mutual interest. They were on sufficiently intimate terms that Baxter sent Shaw a wedding announcement when he married Lucia Allen Millet.
78. Lloyd J. Graybar, *Albert Shaw of the Review of Reviews* (Lexington: University Press of Kentucky, 1974), 26.
79. Bird & Son to Nolen, Nov. 1, 1912, NP, box 37.
80. His grandfather, Francis William Bird, was a well-known abolitionist and the 1872 Republican gubernatorial candidate in Massachusetts. His mother, Anna Child Bird, was a Republican Party activist and a suffragette.
81. George Gore (a Bird & Son employee involved in planning projects) to Nolen, Nov. 6, 1914, NP, box 37. After the collapse of the Progressive Party in 1914, Francis William Bird moved back to Massachusetts and bought the *Boston Daily Advertiser* and the *Boston Evening Record.* The papers were sold in 1918, and he died shortly thereafter.
82. Various correspondence, NP, box 37; Walpole Town Planning Committee, *Town Planning for Small Communities* (New York: D. Appleton, 1917).

83. Anna C. Bird, "Game Plan," Feb. 1934, NP, box 37.
84. Various correspondence among Murphy, Bird, and Nolen, NP, box 37.
85. At the dissolution of Blair and Co. in 1920, the partners' ownership stakes were Blair, 48 percent, Dennis, 30 percent, and Edgar L. Marston, 22 percent. Upon dissolution the records were destroyed. See "Partner in Blair & Co., Dissolved in 1920, Sued for Accounting by Member's Estate," *New York Times,* Feb. 10, 1937, 33.
86. Margaret Ripley Wolfe, *Kingsport, Tennessee: A Planned American City* (Lexington: University Press of Kentucky, 1987), 17. According to Wolfe the other investors included Isaac T. Mann, W. M. Ritter, Norman B. Ream, and James A. Blair.
87. "New Yorkers Buy Big Farm," *New York Times,* June 3, 1914, 1.
88. "How Ryan Rose in Wall Street," *New York Times*, Nov. 24, 1928, 8.
89. John Reps, *The Making of Urban America: A History of City Planning in the United States* (Princeton: Princeton University Press, 1965), 382–412.
90. Dennis and his brother Henry had more than a business connection to the Blairs. James A. Blair, who was C. Ledyard Blair's bachelor cousin (and who appears in the photograph of railroad investors in the Kingsport archive), left nearly his entire estate to John Dennis with the exception of his personal effects, which he left to Henry Dennis and his wife. "Col. Blair left $955,030," *New York Times*, Jan. 30, 1936, 20.
91. See Wolfe, *Kingsport*, 16–17. Useful details can be culled from Wolfe's book, though some facts are inaccurate (Nolen's doctorate from Hamilton was honorary, not earned; J. B. Duke was not the client for Myers Park, though he lived there). Her conclusions about the importance of Johnson relative to the large capitalist interests who, for all practical purposes, controlled the project overlook the larger context, and such misplaced emphasis is a repeated flaw.
92. Ibid., 36, 43.
93. Ibid., 55.
94. The village was named for Samuel Chapman Armstrong, a brevet general in the Civil War and founder of Hampton Institute, a school in Virginia intended to educate freedmen. The village was platted and built,

but it was used to house the employees of the nearby Borden Mills, rather than as a racially segregated neighborhood.

95. T. F. Ryan had large holdings of CC&O Railroad, Clinchfield Coal Corp., Holliston Mills, Inc., the printing company J. J. Little, the Securities Company, and Pennsylvania-Dixie Cement Corp., all local Kingsport industries or corporations with subsidiaries there. For a listing, see "Stock Holdings in the Ryan Estate," *New York Times,* Feb. 16, 1932, 14. According to Wolfe (*Kingsport,* 34) the Securities Company owned more than half of the Kingsport Brick Co.
96. Wolfe, *Kingsport*, 25.
97. Draper thought the park area was too large to be supported by the size of the community. See James Arthur Glass, "John Nolen and the Planning of New Towns: Three Case Studies" (Masters thesis, Cornell University, Ithaca, N.Y., 1984), 67, 107 n. 60.
98. *Refractories Company Towns*, Historic American Building Survey no. PA-5976, National Park Service, Dept. of Interior, Washington, D.C.; Kim E. Wallace, *Brickyard Towns: A History of the Refractories Industry Communities in South-Central Pennsylvania* (Washington, D.C.: America's Industrial Heritage Project and Historic American Buildings Survey/Historic American Engineering Record, 1993).
99. Margaret Crawford, *Building Workingman's Paradise: The Design of American Company Towns* (New York: Verso, 1995), 160; Wallace, *Brickyard Towns*.
100. Reps, *Making of Urban America*, 414–38.
101. See, for example, Clinton Mackenzie, *Industrial Housing* (New York: Knickerbocker Press, 1920); Morris Knowles, *Industrial Housing: With a Discussion of Accompanying Activities* (New York: McGraw-Hill, 1920); and Leifur Magnusson, *Housing by Employers in the U.S.,* Bulletin of the U.S. Bureau of Labor Statistics, no. 263 (Washington, D.C.: Government Printing Office, 1920). The Plan of Ojibway, Ontario (*NTFO,* p. 72), is a steel industry example that appears in Knowles's book; it was designed by the firm of Carrère and Hastings, but was never completed beyond street layout.
102. "Model Factory Town Is Planned in Pennsylvania," *Christian Science Monitor*, May 24, 1916, 13.

103. Charles C. May, "Some Aspects of Industrial Housing III: The Need for Maintenance Measures," *Architectural Forum* (Mar. 1918): 75–80. This article, referred to on page 60, was one of three proposed for inclusion in the book as appendices. It describes the misuse of industrial housing by tenants and the need to teach them how to properly live in and maintain the houses built for them. It refers specifically to Kingsport, and demonstrates the impulse to Americanize foreign workers, or change the domestic habits of those recently relocated to a more urban setting. See notes 106 and 130 herein on other omitted appendices.
104. Meeting announcement for Cohasset Men's Club, Dec. 21, 1911, NP, box 72.
105. John Nolen, "Town of Cohasset: Recommendations and Report," unpublished typescript, 1912, NP, box 72.
106. See F. L. Olmsted, "Village Improvement," *Atlantic Monthly* (June 1905): 798–803. This article, referred to on pages 16–17, was one of three proposed for inclusion in the book as appendices. It was found among the papers of Fredrick Law Olmsted Sr. by his son Fredrick Jr., who added material to the beginning and end. The elder Olmsted describes the simple charms of New England village life during his boyhood, and Olmsted Jr. discusses good and bad aspects of the New England village improvement movement. The article expresses Nolen's admiration and Baxter's evident love for New England village life. See notes 103 and 130 herein on other omitted appendices.
107. Oliver H. Howe, "Civic Centers of New England," *American Architect* (Feb. 1920): 173–76; "Early Town Planning in New England," *American Architect* (Oct. 1920): 464–69; "Stumbling Blocks to Civic Planning," *Modern City* (Mar./Apr. 1926): 42–45.
108. Oliver H. Howe, "Public Spirit in Cohasset," *Cohasset Citizen*, May 4, 1917.
109. "Beautifying Cohasset," Boston transcript, July 17, 1917; Oliver H. Howe, "Public Spirit in Cohasset," *Cohasset Citizen*, May 11, 1917.
110. Burtram J. Pratt, *A Narrative History of the Town of Cohasset, Massachusetts*, vol. 2 (Cohasset: Committee on Town History, 1956).
111. The irony of German methods being used in the war effort against the Germans was not lost on Sylvester Baxter; see his article "The Govern-

ment's Housing Activities," *Architectural Record* 44 (Dec. 1918): 561–65.

112. William E. Groben, "Union Park Gardens: A Model Garden Suburb for Shipworkers at Wilmington, Delaware," *Architectural Record* 45 (Jan. 1919): 45–64.
113. *War Emergency Housing Report of the United States Housing Corporation* (Washington, D.C.: Government Printing Office, 1920).
114. For a thorough account of Myers Park and its relationship to Charlotte, see Thomas W. Hanchett, *Sorting Out the New South City: Race, Class, and Urban Development in Charlotte, 1875–1975* (Chapel Hill: University of North Carolina Press, 1998); see also Kratt and Hanchett, *Legacy.*
115. Hanchett, *New South City,* 170–81.
116. Stephens to Nolen, July, 21, 1919, NP, box 99. Duke planned to spend $150,000 on improvements.
117. Wolfe, *Kingsport,* 38. Draper is quoted as saying, "We are all very fond of Dr. Nolen, but when he comes to the office to look over the plans, the only comment he ever makes is 'Shall we have white prints or blueprints, and how many?'" Such a statement ought to be seen in light of the fact that Draper worked for Nolen rather briefly, spent most of his time in the field, and ended his association with some acrimony; see also Glass, "Nolen and New Towns," n. 100.
118. Various Charlotte correspondence, NP, box 98.
119. Ibid.
120. Stephens to Nolen, Oct. 28, 1919, NP, box 98. It is notable that Stephens did not turn to Draper for help with the Asheville plan.
121. Records of Olmsted Associates, microfilm reel 245, file 5109, Manuscript Division, U.S. Library of Congress.
122. Millard F. Rogers, *John Nolen and Mariemont: Building a New Town in Ohio* (Baltimore: Johns Hopkins University Press, 2001), 10–12.
123. Livingood to Nolen, Jan. 19, 1927, NP, box 29, file 24.
124. For a complete account of the development of Mariemont, see Rogers, *John Nolen and Mariemont.*
125. John Nolen, *John Edward Howard Griggs: His Personality and Work* (New York: Huebsch, n.d.), 8.

126. Rogers, *Nolen and Mariemont*, chap. 7.
127. Various drawings, Mariemont folder, NP.
128. John Nolen, "Garden Cities—United States," NP, box 30.
129. Gregg M. Turner, *Venice in the 1920s* (Charleston, S.C.: Arcadia, 2000).
130. Planning books of the period, and Nolen's in particular, have extensive bibliographies and appendices full of reference material. Each of the three appendices proposed in Baxter's manuscript but omitted from *NTFO* sheds light on the text and the period. See notes 103 and 106 herein on the first two omitted appendices; the third was an excerpt from a contemporary novel that described the conflict between the street layout of San Francisco and its hilly topography—an issue that preoccupied both Nolen and Baxter. A small part of it appears in the caption to the picture of San Francisco (*NTFO,* facing p. 14). See Gelett Burgess, *The Heart Line: A Drama of San Francisco* (Indianapolis: Bobbs and Merrill, 1907), 246–49.
131. T. K. Hubbard to Nolen, May 25, 1927, NP, box 1.
132. Howard to Nolen, June 21, 1927, NP, box 1.
133. "In City Planning a Vision of a New America," *New York Times*, Nov. 13, 1927, BR 2.
134. Foster to Nolen, June 6, 1926, NP, box 76.
135. Hancock, "John Nolen and the American City Planning Movement," 604.
136. Rodgers, *Atlantic Crossings*, 414–16.
137. Hancock, "John Nolen and the American City Planning Movement," 441–47.
138. Unwin to Nolen, Feb. 2, 1937, NP, box 8.
139. H. B. Doust to Nolen, Feb. 24, 1937, and note to Nolen Jr., Apr. 9, 1937, NP, box 1.