The New Deal Health Infrastructure of New York:
The Hospitals of Isadore Rosenfield

BY CHARLES GIRAUDET

In New York, the New Deal saw the construction of a new breed of hospitals under the direction of Isadore Rosenfield (1893-1980). Though quasi-unknown today, his contribution to the field of hospital design cannot be overstated in terms of the quantity of facilities he built on four continents and the philosophy underlying his activities as an architect, planner and educator. Currently, though, even his most successful buildings are being demolished or converted without documentation. The author examines the context and some issues encountered in his photographic recording of these facilities and looks at their potential considering today’s larger challenges.
Goldwater appointed him as his assistant. In this position, Rosenfield became the architect responsible for a program of construction that would include hospitals and a number of ancillary buildings all over the city. In this capacity, he collaborated with and supervised private designers who would be the architects of record for the various projects.

In 1936, the penitentiary just south of the 59th Street bridge was demolished and in the following years the island saw the construction of a 600-bed nurses residence, a power plant, a convalescent center, an industrial laundry/garage/fire station and two chronic diseases hospitals (1620 and 2000 beds).

**Goldwater**

The Welfare Hospital for Chronic Diseases, later renamed, and finally known simply as Goldwater, was the plan’s flagship. It was built between 1936 and 1939 with Butler and Kohn, Yorke and Sawyer Arch., an architecture office specialized in hospital design in which Rosenfield had worked as a young architect.

The interest generated by the project and the construction of this first-of-its-kind hospital was tremendous. Science, in its virtuous march, was coming to New York to eradicate the afflictions that struck so many. The progress of Goldwater’s construction, its budget ($8.6 million) and the description of its ambitious program were often discussed in the newspapers.

In a 1938 article titled “The Fruit of Research” Rosenfield describes the design process:

> This hospital is unique in its general plan and disposition of parts. It is based on strictly functional planning, which means that in disposing the parts the first consideration was given to the peculiar needs of chronic patients and administration. This involved the problems of circulation, control, orientation, view, ample ground space. No concession was made to any preconceived notions as to arrangement that would produce a beautiful picture or pattern. The arrangement presented here is frank, honest and straightforward. It was reasoned that if all the parts were arranged in an orderly manner meeting the functional needs, the result would have esthetic wholesomeness. The illustrations bear out the correctness of this assumption.

The patients’ wards were organized in two pairs of four-story chevron-shaped buildings oriented south. Each floor housed two wards for a total of 32 wards. In the middle of each pair was a pavilion for visitor access. Works Progress Administration (WPA) murals decorated four of the solariums.

In the middle of the ensemble a larger building housed the main entrance, admission, administration, therapy offices, surgery, dining halls, kitchens and associated storage, trash processing, reception of merchandise, two floors of residences for medical personnel and technical areas in the basement and the top floors.

North of the campus and at the head of the connecting corridor, a small building was dedicated to research, and also housed the morgue and its adjacent chapel.

The basements contained research labs, all the technical and ancillary activities, storage and workshops for a number of trades. The facility as a whole was designed to function autonomously.

In 1972, a new “activities” building designed by William Lescaze (1896-1969) was added at the south end of the connecting corridor. It contained chapels for four religions, a library, rooms for sports and other activities, a radio studio, large quantities of storage, and a theater with a stage that could be converted into a basketball court.

Following Mayor Bloomberg’s decision to remove the hospital to make room for Cornell Tech, a “technology, business, law and design campus”, it took 22 months to demolish Goldwater – a complicated endeavor given how well it was built – during which I took close to 20,000 pictures, documenting every room, closet, staircase, corridor, and technical space in the 900,000 square feet (sq. ft) facility, in a constant race against demolition crews. During that time I saw how the building was designed for the comfort of patients and staff. I marveled at the intelligent details and how the space was bathed in natural light. I found out more about the man who had designed it, whose name I first saw on the construction drawings with the modest title of Research Assistant.

**Isadore Rosenfield**

Born in 1893 in Russia near Moscow, Rosenfield emigrated with his family to Boston in 1912 to escape the pogroms. He worked in a frame shop and as a butcher’s assistant when his flawless English got him noticed by a wealthy woman who sent him to High School and then to Harvard.

Jane Jacobs (1916-2006) tells us what happened next:

> He early discovered that most good ideas float around and eventually die in a sea of talk, but an architect has the special advantage of being in there with his ideas precisely at the time action of some sort has to be taken. This heady discovery switched him in his third year at Harvard from a social ethics major and settlement-house worker into the school of architecture.

Out of Harvard, Rosenfield worked for several firms specializing in hospital design before he joined New York’s Department of Public Works in 1934. In 1945 he left it to open a private practice and remained in charge of the post-war $100 million public hospital construction program. He retired in 1972 and died 10 years later.

As early as 1932, a large part of his activity was dedicated to teaching and consulting, often pro-bono. He wrote dozens of articles and reports and three reference books. He considered that making better hospitals was a civic duty. At Columbia University he created a master’s degree in hospital planning where architects were taught alongside future administrators.

Hardly a household name today, Rosenfield could write of himself in a 1952 letter to the AIA, that “(...) in his thirty years of professional activity, he probably designed or directed the design of more hospitals than any American architect.” At that time, he had built over 66.
Principled Design Principles

We can see Rosenfield’s method most plainly in his work in Puerto Rico, where he started with a broad assessment of local resources. From there he proceeded with a territorial distribution of health centers and then to the programs of individual hospitals and other facilities, several of which he built. In his second book, he argues that building hospitals without addressing other issues simultaneously (demand for health services, health education, medical staff training, population income increase, etc.) can be counter-productive because the significant expense of hospital construction can drain limited resources. A project should start with a study of local “conceptions of disease, ideas on what constitutes health, technologies of medicine and building, social forces and esthetic attitudes.” He clearly drew on his social science background for methods and ideas on how to integrate this spectrum of concerns and values into his planning considerations. Yet, he saw the architect as uniquely competent in navigating that complexity, provided s/he “understands the health apparatus in its relation to the rest of society in broad terms.”

At every scale, there were principles and methods to be considered, and while the latter were systematically questioned and re-evaluated, the former were firm and based on universal human rights, and the belief that human societies existed in order to improve the well-being of their members. These principles were stated so as to inform decisions at every step of the project, and rationally achieve all the progress possible for the minimum cost.

Rosenfield’s approach was thus multi-scalar and interdisciplinary. It may well be that, at least in part as a result of his efforts, life expectancy in Puerto Rico went from 46 years in the late 1930s to 70.6 years in the 1960s.

When it came to a single building, Rosenfield seems to have proceeded under the assumption that architecture itself was a healing instrument. He was single-minded in the effort to translate the therapeutic imperative into spatial arrangements. His systematic approach led him to re-examine a building’s characteristics from its general orientation to maximize sun exposure and relaxing views, to the design of the patient’s bed where the medical consultation took place. He often refused his client’s assumptions and reformulated them until he was satisfied with the coherence of the program with its goals, and realistic space allocations had been made. The design followed this extensive programming phase.

Rosenfield also developed systems of metrics to integrate his research into program elements and dimensions. Calculations were used both to generate and verify hypotheses based on experience. For example, the number of patients multiplied by a patients’ average stay yielded a number of visitors per day. That number was then used to determine the sizes of lobbies and elevators, but also to help gauge the need for and nature of recreational facilities. It is important to remember that while many of these methods may seem standard today and have turned into norms (think of the asymmetrical patient bedroom door for instance, which Rosenfield developed at Beth-El), they were innovative at the time and allowed for the rational development of an entirely new generation of hospitals. They also placed the architect at the center of the planning process rather than relegating him/her to the role of a mere decorator, thereby avoiding costly mistakes.

In Rosenfield’s projects, the plan grew out of a circulation pattern designed to give patients the fullest access possible and staff the most effective working conditions. In Goldwater, the connecting corridor functioned as a street, with the wards intentionally as dead ends. Entrance pavilions split the flow of visitors and provided lounges for visiting. Balconies, roofs and gardens were in most cases within a few feet of anywhere in the building.
His hospitals were carefully designed for growth, with extensions anticipated. This could mean the future addition of research labs, or the rearrangement of the circulation, as illustrated by the easy siting of the J-building in 1970 at Goldwater. Another example would be the boiler room in Delafield Hospital, which was built to become the basement of a new five-story building erected twenty years after the first building. In general, Rosenfield was a believer in developing hospitals horizontally as opposed to vertically to take into account the economy of building and maintenance, the ease of planning, operation and expansion, and to “avoid the pitfalls of monumentality.”

The buildings I have observed up close all shared state-of-the-art construction in workmanship and materials. Goldwater was built with 2,700 windows in bronze (for its low-maintenance and self-lubricating properties), marble and glazed brick partitions, etc. The structure was concrete and steel with two layers of masonry enclosing an asbestos layer for waterproofing. Wood was solid and paneled, with generous sections and fine details.

Of particular note is Rosenfield’s unwavering attention to light, a lifelong interest of his that reflected the heliotherapeutic ideas of the pre-antibiotic age. Patients would have access to windows, balconies, terraces, roofs and solariums, but so would doctors, surgeons, cooks, and other staff. He argued eloquently for these accommodations on the basis of best performance, comfort, health benefits, and went to great lengths to provide natural light to all the spaces where humans were working, including the basements, that he would position in elevation so they could take advantage of the natural movements of the site for window placement.

We can see from these design principles that for Rosenfield, patient care was more than a medical endeavor. Jane Jacobs wrote that “His notion of functionalism is elastic and extends to the emotional content of the hospital.” He saw health holistically, and this is particularly obvious in his chronic diseases hospitals, where patients might spend years or even a lifetime.

As a photographer wandering through empty wards, and later through interviews with staff and patients, I became convinced that Rosenfield sought to create the conditions for the emergence of a community, though he doesn’t specifically talk about it. Solariums and circulation spaces played a particular role in this. In their architectural formulation, they make clear that their raison d’être is to serve for social activities beyond the confines of the purely medical aspects of care.

In fact, one of the more intangible yet clear characteristics of Rosenfield’s buildings is the genuine affection they elicit in the people who live in them. A policewoman told me how she used to love walking the long corridor in the silence of the night, looking out at the city on the other side of the river. A doctor said that for her, Goldwater was like “a happy bubble”. A former facilities director came after hours to open doors for me so I could take pictures of the building he had maintained for 30 years. Talking about the adjacent power plant, another gorgeous Rosenfield building now closed, an engineer said to me in a lowered voice, “We took good care of that place.” During its 70 years of service, Goldwater was profoundly loved by both its patients and staff. Its demolition, which forced the dispersion of the community, was traumatic and experienced as the loss of a home.

It is difficult to point to anything specifically that could explain such affection, but Rosenfield’s buildings exude a feeling of respect in the way they anticipate the bodies of their inhabitants, whether ambulatory or wheelchair bound, who might look out a window in the middle of a workday, gather in a solarium for an activity with other residents, or make a difficult day less so by taking in the light and the spectacular views.

As I walked through Goldwater, the T-building, or Delafield, I often felt a point of rest, a moment of silence made into space, something I have experienced rarely and only in the best of architecture. It was unexpected in this context. Comfortable dimensions and proportions, a reliance on geometry to define the spaces, transparencies, and a rhythmic unfolding of planes made taking pictures remarkably easy. Ilya Bolotowsky’s (1927–1981) WPA mural in one of the solariums captured the elegance beautifully.


Isadore Rosenfield with Kohn & Butler, Yorke and Sawyer Arches, Goldwater Hospital, New York, USA, 1939, view west to Manhattan from ward building C. © Charles Giraudet, 2014.
Documentation Challenges
The work I did at Goldwater became the template for my documentation process: the photography would follow two axes, one systematic, where I would enter each room and record its characteristics, and one intuitive, where I would record the architecture changing in time, as a witness. The body of images provides a photographic matrix of the building echoing its vanishing body. I believe everything that happens in a building connects in some way to its architect, including the most dramatic phases of its life: construction and demolition.

To document these buildings, a number of obstacles have to be surmounted that reveal aspects of their architecture and of the larger context that determines their fate. To begin with, they’re very large: 900,000 sq. ft (83,600 m2) for Goldwater, with 820 rooms for the wards alone. There isn’t much repetition in the spaces, making it rewarding to walk through every door, a time-consuming process. When rooms are left abandoned, locked or walled-up, they’re often worth the extra effort to get them open. In the T-building, one of these was the sterilization room, an essential function in a tuberculosis hospital. It was intact despite the crumbling plaster walls. In Delafield, a walled-up staircase was opened for me where no one had penetrated for 40 years. The original architectural metalwork removed elsewhere was still present there, along with a row of antique generators and an air handler that was still churning unbeknownst to the maintenance staff.

The laws that protect patients’ privacy and forbid access to the daily activities in a hospital while it is in operation create another obstacle. This means that the only documentation possible is of the traces of these activities, if any remain within the space after decommissioning.

All of these hospitals have been transformed to some degree since they first opened, yet little to no effort has gone into maintaining an orderly record tracing the changes. In most instances, plans are missing altogether. I routinely find myself correcting or re-establishing layouts, if only to key pictures to spaces. The improper record keeping is also costly in terms of maintenance and implies reliance on staff memory. (A plumber once called me for help on locating a riser!)

But by far the most vexing obstacle is that of access itself, a difficult and unpredictable process rooted in the widespread indifference to the history and architectural worth of these buildings, and the politics that revolve around them. The unusual nature of a request for documentation makes administrators suspicious as it may challenge the boundaries of their job descriptions or contradict the narrative for a building’s conversion or demolition.

Heritage is a term more often used, though it doesn’t carry the same connotations of potential, and in any case, it is almost never used when talking about health facilities. These are seen as essentially functional fixtures in the urban fabric, in implied contradiction to their role as anchors of civic life and associated historic significance. “This is not the way we do it here!” is an answer I am often given when I ask why re-purposing was not looked at as a serious alternative to demolition. Behind this honest statement, sometimes delivered with resignation or a tinge of guilt, lies a whole culture and powerful vested interests, that would be useful but outside the scope of this article to examine.

The State of Things
After the demolition of Goldwater Hospital (1939-2015) was completed, a demolition manager bragged to me that “not a piece of it larger than an eighth of an inch remains on site.” Apart from my own, I am not aware of any efforts to gather evidence of what this hospital has meant for the city and the people who lived and worked in it.

The power plant of Roosevelt Island is now abandoned. Its spectacular interior is deteriorating, with animals having damaged the pipe’s asbestos protection. There are no plans for its demolition or re-purposing.

The T-building of 1941, sold by the city, as was Goldwater, for $1, is currently being transformed by a private developer into a mix of affordable and middle-income housing.

The Delafield Hospital, 1950-1975, was transferred to New York City Housing Authority (NYCHA) in 1984. It is now home to independent elderly people and their families. It is on its way to privatization under Mayor de Blasio’s plan to reduce NYCHA’s deficit. Once in private hands, it will all but certainly be demolished given the value of its site.

The luxurious Nurses’ School and Residence (1954) just
south of Bellevue Hospital, with its ground floor clad in pink marble, is still operating as it was intended but is slated for imminent demolition so the site can be turned into a $200 million Department of Sanitation garage. This gem of a facility, with most of its finishes and architectural features intact, is a time capsule of its era, even yet the people who argued against its demolition never mentioned its architecture as worthy of preservation. It has not been documented to date.

Of all the facilities on Roosevelt Island, Coler Hospital is the only one still in operation, though at half capacity. There is talk of its sale to help finance the deficit of the New York’s Health and Hospitals Corporation, its parent administration.

The list would be too long of the buildings already demolished or abandoned. There are few that are still in operation, such as the main building of Kings County Hospital or the nurses’ residence at Queens General, and a scattering of ancillary buildings. Seventy years after the city built itself an infrastructure that was the envy of the rest of the world, most of it is in the dumpster, without public debate or documentation.

Rosenfield often included the following words under his name to summarize his vision of architecture: “To him, architecture is primarily an instrument for the promotion of social well-being and making Democracy a reality.”

The hospitals of the New Deal are a testament to the excellence of the work of a civic-minded generation, to their ideas, ideals, and their wisdom, for whom Rosenfield stands as a singular example, modest and ambitious, talented and farsighted. Those who gave us this infrastructure built it so that it could serve not only their own, but also future generations. Yet, although these hospitals were once heralded as great achievements and a source of civic pride, there is little chance that any of them will still be standing in thirty years. All of them are already threatened.

The speed and circumstances under which this is happening endangers the possibility of establishing a historical record. We should know, as a society, that the values we wish to uphold are contingent on our knowledge of the history in which they are rooted. Patrimony is the embodiment of that history. I am concerned that we might be condemning ourselves to blindness by depriving ourselves of the knowledge contained in these works. There is urgency in documenting what is still standing. There is much to be learned from these gems of architecture and the communities that live in them.

It is not simply because we want a better archive that we need this knowledge: as we seek to adapt our cities to climate change and its consequences, we will need it to inform forward-looking design with humanist values and architectural thinking. Rosenfield had an ambitious view of an architect’s unique talent and responsibility that resonates today. With 52% of the world’s carbon extracted for construction*, and the survival of our species itself in question, architects have again a key role to play in proposing alternatives to the status quo and the current demolish/rebuild model. A nexus between conservation, environmental responsibility and forward-looking design is quickly emerging that will eventually enter the equations of decision-makers and stimulate architects everywhere, as exemplified by the initiative launched in the United Kingdom by the “Architects Declare” group* that proposes among other pledges to seek to “upgrade existing buildings for extended use as a carbon efficient alternative to demolition”.

Considering the challenges to our democracies and to our environment, we can only hope for a more enlightened approach to our built environment. Rosenfield’s hospitals give us a map to trace our steps back to a viable future.

Notes
1 Isadore Rosenfield, “The Fruit of Research”, Modern Hospital, March 1937, Vol. 48, 56-64.
2 In part with the support of the Clarence Stein Institute at Cornell University and the Architectural League of New York.
3 A new facility was built on Rykers Island.
5 Works Progress Administration, a New Deal administration that put Americans to work on public infrastructure as of 1935. A number of artists decorated public buildings under this program.
7 Isadore Rosenfield, “Brief Statement of Professional Record”, AIA file, 6 October 1952.
9 Isadore Rosenfield, op.cit.
10 Isadore Rosenfield, op.cit., 5.
11 Isadore Rosenfield, op.cit., 15.
12 Ubiquitous now, this type of door allows for the simultaneous passage of a gurney and a person, thus preventing collisions.
13 Jane Jacobs, op.cit.
14 Jane Jacobs, op.cit.
15 New York City Housing Authority, the New York State entity that provides public housing in New York City. It is facing a $32B deficit in the next five years.
16 Alan Organski, our carbon problem, decarbonizedesign.com.

References
DEPARTMENT OF HOSPITALS, An Experiment in Municipal Organization, New York, Department of Hospitals, 1945.

Charles Giraudet