Rehousing America

Joseph F. Bronsky
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Milwaukee, Wisconsin  
June, 1939
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This book is a collection of images and descriptions related to housing and architecture. It includes illustrations of typical houses from the "Gay Nineties," as well as images of different types of housing developments, including tenements, remodels, properties, and garden homes. The images serve to illustrate the variety of architectural styles and living conditions during that period.
Of what value to Society are the numerous colleges and universities it has created and endowed, of what value to a Young Man are four years spent in such a college or university, if, upon graduation, he is unable to render to Society a single social service for the betterment of mankind, and those less fortunate?

With this in mind, this thesis is dedicated in the hope that it will bring about a single social reform in a large field--Housing, and that the sacrifices of my parents, teachers, and superiors may be returned, for my achievements are but their achievements.

Acknowledgment is hereby gratefully made to Prof. Robert J. Barr, director of this thesis, for his patient help and valuable material, the librarians at the Municipal Reference Library, City Hall, for their aid in securing municipal figures and facts on the Garden Homes Project, Mr. Geo. A. McHugh of the Harnishchfeger Corporation for showing me through the factory where units of "Pre-Fab" Houses are made, the salesmen of Sears Roebuck & Co., for information on "Ready-Cut" Homes, my own mother for her timely clippings, and to my parents, teachers, and friends who made my education possible.

Housing has been, and always will be, of imminent importance to man. It takes its place among the three necessities of life: Food, clothing, shelter. Men, generations, races, and peoples have always been marked or distinguished by their dwellings: The Roman and his villa; the Eskimo and his igloo; the Indian and his wigwam; the Savage and his grass hut with bamboo framework; the Tropical Dweller and his tree-top home to protect him against wild animals; the pioneer and his log cabin; the peasant and his cottage; the aristocrat and his mansion; the King and his palace.

The dwellings of man have always been affected by conditions of climate, topography, and vegetation—skins, grass, ice blocks, wood, and stone—whatever was handy and practical. The architecture of his home was always simple. Wilhelm Hundt in his "Volker Psychologie" (vol., vii) describes the most important types of primitive dwellings "as those embodying the simplest geometric patterns: the circle, the oval, the triangle or quadrangle, being preferred." Thus in the most elementary dwellings and dwelling forms, the tent and the spherical huts, the circle is combined with the triangle, the quadrangle house with the triangle or pyramid-shaped roof ("hip"). (1)

The more civilized and advanced a people become, the more complex become their homes. The more populated and crowded a population, the more complex and serious is the problem of housing itself. And paradoxically, like so many other comforts in our economic life today, the greater the advances in science and building art applied to housing, improved construction, and conveniences of the home, the less available are they to the greater portion of our population.

This thesis deals not with a study of various peoples and their houses, nor with the evolution of housing design. It shall deal with the history of housing only as a background to the economic aspects of present day housing, presenting a cross-section of it and its sources, typical examples of better housing and mass housing projects, their impracticability as a complete cure due to economic aspects they ignore, and finally a plausible yet heretofore undiscovered simple plan on complete urban rehousing. This is the outline of the thesis, and its purpose, briefly stated.

The ancient cities of Rome and Greece, and of Asia Minor were comparatively compact, for their population. Yet, they were known to have aqueducts, water supplies, sewer systems and hardy abodes made from stone and the earth. The Dark and Middle Ages, and march of civilization over Europe was marked with its stately stone castles, and huts of peasants and serfs, in units sustaining the feudal system. Only the Industrial Revolution of the 19th century catapulted
people into urban congestion, contact, and conditions ghastly "intolerable". Zoning, planning, and sanitary extensions could not keep up with new building around the heart and walls of older cities, and many medieval towns and rapidly growing cities paid for their poor housing by falling prey to plagues and epidemics, which wiped out many of their unfortunate population.

Turning towards America, we find our housing problem most serious, though as young as our civilization itself, beginning not before the 19th century. At that time civilization was found only east of the Appalachians. Since that time, and during only a few decades following, population pushed westward, in all corners, first in farming centers, then to be followed with industrial development in urban centers. The rise of American cities from 1850 onward can be stated as due to population increases through 1) immigration, 2) the influx of country families or children in seeking work in industries springing up, and 3) an increasing birth rate. Cities soon became overgrown villages. Along two-story Main Streets, with living units above the stores, arose scattered eight story "skyscrapers" of masonry and stone. Behind stretched a city of mud streets, wood sidewalks, gas lamps, stretched wires, wagons, and simple one-story wooden houses mostly without basements. Styles of architecture and methods of city planning differed in various cities. Nevertheless, in each case there was the exclusive section of the town with its brick mansions, and
liveries or stables with coachman's quarters in the back. Today, these stand as relics of a gayer day, and old-fashioned splendor, as they are converted into light-housekeeping rooms, with wooden third-story fire escapes, and sadly darkened and sandwiched between tall residential apartments. Adjoining these districts were built the cottages and simple homes of workingmen, with walking distance to work, green markets and the downtown area. Many of these were later remodelled as their owners reinvested their savings in bettering their homes, or were moved to the rear as flats and more elaborate two-story homes and duplexes were erected in front of them. That type of dwelling was most preferred by people who wanted a safe place, or greater return for their savings, though among these cottages and duplexes are still standing more elaborate houses of the "Gay Nineties" period with its "superfluous" architecture. Cupolas, invariably topped with weathervanes, fancy and varied-colored art glass into the air, with dark, unventilated rooms, is unabove windows, scroll work and fancy trimmings on front porches, eaves, and window frames, and hand carved woodwork inside were what distinguished a well-built house and were pointed to with pride by their owners. Many of the simple narrow one-story dwellings, however, are still standing, and remain sharply out of balance with the more modern
dwellings erected by its neighbors, so that a neighborhood will invariably present a mixture of cheap little cottages, very old and more modern duplexes, and obsolete "Gay Ninety" homes, in a total lack of uniformity or matching design.

The rise and construction of great numbers of tenements before the close of the 19th century can neither be overlooked. Most of them, built up to the lot lines, and of the dumb-bell type, were arranged row on row, so as to form solid blocks of them, while others were scattered in clusters so as to provide unsatisfactory crowded conditions as well, or through the neighborhood in which they stood out of architectural harmony. These obsolete crowded tenements today comprise at least half of the housing problem, and in New York City, 99% of it. To understand the real nature of a tenement, let us turn to a description of it by one author who was concerned with this problem as early as 1900, when he wrote:

"The typical New York Tenement is known as the "double-decker", "dumb-bell" tenement, a type which New York has the unenviable distinction of having invented. Any housing conditions are ideal compared to the conditions in New York. The tall tenement house, accommodating as many as 100 to 150 persons in one building, extending up six or seven stories into the air, with dark, unventilated rooms, is unknown in London or in any other city of Great Britain. It was first constructed in New York about the year 1879, and with slight modifications has been practically the sole type of building erected since, and is the type of the present day. It is a building usually five or six or even seven stories high, about 25 feet wide, and built upon a lot of land of the same width and about 100 feet deep. The building as a rule extends back 90 feet, leaving the small space of ten feet unoccupied at the rear,
so that the back rooms may have some light and air. This space has continued to be left open only because the law compelled it.

"Upon the entrance floor there are generally two stores, one on each side of the building, and these sometimes have two or three living rooms back of them. In the center is the entrance hallway, a long corridor less than 3 feet wide and extending back 60 feet in length. This hallway is nearly always totally dark, receiving no light except that from the street door. Each floor above is generally divided into four sets of apartments, there being seven rooms on each side of the hall, extending back from the street to the rear of the building. The front apartments generally consist of four rooms each, and the rear apartments of three rooms, making altogether fourteen upon each floor, or in a seven story house, eighty-four rooms exclusive of the stores and rooms back of them. Of these 14 rooms on each floor, only four receive direct light and air from the street or from the small yard back of the building. Generally, along each side of the building is what is termed an "air shaft," being an indentation of the wall to a depth of about 28 inches, and extending in length for a space of from 50 to 60 feet. This shaft is entirely inclosed on four sides, and is of course, the full height of the building, often from 60 to 72 feet high. These "air shafts" are to provide light and air to the five rooms on each side of the house, which get no direct air or light from the street or yard; but they are too narrow and high, and without any intake of air at the bottom, to leave these rooms nothing but foul air and semidarkness, with the noise, smells, and emanations of eleven other apartments, and act as flues in case of fire.

"Rent for four tenements rooms, facing the front is usually $12 to $21 a month. Only two are large enough to be rooms. The front one the family uses as a parlor, and often at night, when the small bedrooms opening upon the air shaft are so close and ill-ventilated, mattresses are dragged upon the floor of the parlor, and there the family sleep, all together in one room. In summer, the rooms are so hot and stifling that a large part of the tenement house population sleep on the roofs, the sidewalks, and the fire-escapes. The kitchen on the air shaft is usually totally dark except on the upper stories. The three-room rear apartments range from $10 to $15 a month. In the
public hallways, opposite the stairs, there are provided two water-closets, each being used in common by two families, and being lighted and ventilated by the "air shaft" which also lights and ventilates all the bedrooms.

"But," concluded the author, "it is not to be wondered at, therefore, that wish such a kind of tenement house repeated all over the different parts of New York, and forming the only habitation for the great mass of the people, the tenement house system has become fraught with much danger to the welfare of the community. They are places in which thousands of people are living in the smallest space in which it is possible for human beings to exist—crowded together in dark, ill-ventilated rooms. They are centres of disease, poverty, vice, and crime, thieves, drunkards, and prostitutes, due to the indiscriminate herding of all kinds of people in close contact." (2)

Continuous legislative reforms have slightly bettered tenement conditions. The airshaft had to be built wider, building heights lessened, and a larger rear yard provided. But such bettered apartments are rare, and improvements only slightly noticeable, and although the above author wrote in 1900, the following testimony taken before a 1935 Senate Investigating Committee shows that such conditions are still the same 35 years later:

MRS. HARRIS. Mr. Chairman, and members of the committee, and Senator Wagner. I am a mother of the slum area, and I am speaking for many, many thousands of mothers like myself who cannot come here personally. When I speak, I speak for them all. We live in houses that should have been condemned perhaps 25, 30, or 40 years ago. We are not living there by choice; we are living there by necessity.

THE CHAIRMAN. How many rooms in your tenement?

MRS. HARRIS. I live in four rooms.

THE CHAIRMAN. What rent do you pay?

MRS. HARRIS. I pay $28.

THE CHAIRMAN. On what floor?

(2) DeForest-Veiller: The Tenement House Problems. Pages 7 ff.
MRS. HARRIS. On the first floor. We have no steam. We have toilets in the hall. There are windowless rooms, which is very, very bad for our children.

SENATOR WAGNER. There is no sunlight in the room?

MRS. HARRIS. No sunlight at all. There is no window in the bedroom at all. If there is a window in the bedroom, there is a stone wall facing it and no sun ever finds its way there at all. The toilets are in the public hall.

We live in a house that houses 30 families, and perhaps 4 or 5 tenants use the same toilet. They come in and go as they want. People from the street can come up and use that toilet, and of course our own families have to use it too, and before we know it, something terrible has happened to our children.

Now I would just like to say this to you: We live about 30 families to a house that has no windows and no sanitation at all. We want better homes for low rentals, that we will be able to pay according to our husbands' earnings. We also want houses in the neighborhood that we live in now. We cannot afford to move away too far as the cost of transportation takes away from our children money that we may need for necessities.

You cannot enforce sanitation in houses that have been erected 50, 60, or 75 years ago.

Another visitor to this committee, a Mrs. Rosa Beleteri, Lower East Side Housing Conference, testified at the same time:

MRS. BELETERI: When the Knickerbocker Village (Exclusive government slum project) was built, we got pushed from one side of the street to the other. I live in a place that is 75 years old. The toilets were in the yard, but now they brought them in the house. It is an old chicken house.

SENATOR WAGNER. Does any sunlight get into your bedroom?

MRS. BELETERI. No sunlight, at all, unless we light the electric light. That is all the sunlight that we get. If there are windows, they face a wall on the other side of the window, and there is a big stable in front of the other windows.

Another witness before the Committee had these observations of her living quarters in New York:

THE CHAIRMAN. Where do you reside?
MRS. ZIRPIN. 361 Grant Street, lower East Side. I represent the younger group of mothers.

THE CHAIRMAN. How many rooms in your tenement?

What rent do you pay?

MRS. ZIRPIN. Four rooms. $27.50, coal flat, a wooden stairway, vertical fire escapes, a fire trap. If I should go away—I am forced to go out and work, I must leave the babies behind with my aged crippled mother, and imagine what it means if a fire should break out in the building, Mr. Speaker. In one East Side outbreak, two years ago, 81 lives were sacrificed. (3)

Crowded tenements, then, owned mostly by absentee landlords, are but one type of housing problem today; and these absentee owners care nothing for the social consequences, the filth or welfare of those whom they house. Their buildings were erected chiefly for profit, and today they are interested in obtaining every possible rent dollar from their depreciated holdings.

Housing in the 20th century is marked by "spurts" or "booms", rather than one continual building of new homes. The period of 1909-10 marked a great building boom, consisting mostly of duplex flats, of almost identical design, built row on row or among bungalows in the ever widening residential fringe surrounding cities. The appearance of "scrip" and the bank panic at that time, caused many people to invest in real estate, especially in the form of an added story to their new homes to "rent out" as a source of income and safe keeping of their surplus savings. Where the small cottages of an earlier period were moved to the rear to provide room for the newer "flat" in front, a triple

(3) Hearings before Senate Committee on Education and Labor, June 4-7, '35.
return from the property was realized. More simplicity in design marked these duplexes, separate front and rear entrances, and two small stained glass windows on the side above the place for the piano in the parlor, as well as broad front porches extending the entire front width of the house, with an upper deck above the lower one for the first floor occupants.

Building activity among residences was at a standstill during the war, with almost all workmen, not drafted for war service, engaged in industrial construction. Home building was not resumed until after the war, when returning soldiers, postponed marriages, delayed housing construction created an unprecedented housing shortage. Rentals of existing dwelling units soared to heights never previously attained nor since equaled, so exorbitant, that legislative limitations, established rent commissions and government intervention was necessary, though their effects merely feeble. So many men returning in need of clothing, necessities, and comforts of life, new couples in need of furniture, linens, and household goods, created a boom of high wages, manufacturing expansion and continued prosperity. The building of additional homes in newer subdivisions laid out over farms surrounding cities, together with duplexes of a more modern design, if not more massive, and a few apartments, characterized the building activity of this period. An economic slump and aftermath of 1921 was soon arrested by renewed industrial activity, and inventions as the radio, automobile, airplane,
and new electrical appliances, as well as the task of replacing the old with more new modern designs and styles, continued prosperity and the high American Standard of living. More and more elaborate homes were desired, in newer subdivisions farther away from the downtown sections of cities. Millions were made in real estate promotions and subdivisions. The higher and more stringent building restrictions placed by subdividers, the costlier were the lots of unimproved farm land. "Hollywood" was combed for names to apply to streets, in keeping with the prestige of new neighborhoods. Picnics, free lunches, souvenirs, newspaper advertising, large signs, and even flagpole sitters attracted people to these farms, with their wooden crops of stakes, street signs, and painted ballyhoo, and agents on the grounds enticed them to make down payments on land for a quick profit. Home Shows made the people all the more "home conscious", especially with their display of home improvements, knick-knacks, and new luxuries. Any person with known income or savings was pursued by real estate agents, and thousands of prospects were thus infused with a warm confidence in rising real estate values and profits, and persuaded to invest in building sites and lots. The resulting costly assessment for improvements, taxes, and falling values in a few years were not foreseen, nor the inevitable total loss of investments in most cases.

The rise of Building and Loan Associations, by which people could obtain luxurious homes with only a small down
payment, and "Pay as Rent" at only $75.00 and up monthly prolonged this urban land expansion. Carrying and interest charges amount to 12% annually, but seemed trifling when included in installments. Dividends paid by associations to investors amounted to at least 6%. No one ever sensed the coming depression in real estate, prices and salaries, which made these installments prohibitive for debtors, and made banks, mortgage lenders, and principally building and loan associations the largest holders of real estate. Dividends were skipped to pay taxes on these new holdings.

Just before 1929, the height of building consisted of, and was reached in, apartment and apartment-hotel construction. These tall, fire-face brick multi-family structures, with artistic fronts and plain sidewalls and backs, speckled cities, as well as formed an outer wall around residential sections. Only their fireproof construction, high rentals, and modern innovations, prevent their being classed as tenements and slums. They were erected as close to the lot lines as possible, facing each other, either in newer outlying sections, or among and between outmoded and shabby small houses in "blight" areas around the center of the city.

Most of these were financed by mortgage and bond holders, and soon went into receivership after 1929, which year marked the saturation point as well as the beginning of declining values and rentals of all housing. Since that time, up to the present, construction activity has only been in individual homes, of a higher cost, for people of better incomes, wishing
custom-built residences, or modest homes for small thrifty wage earners.

Showing this relation of construction activity between one type of living unit and another, are the figures taken from the Building Permits issued in the City of Milwaukee:

<table>
<thead>
<tr>
<th>Type of Unit</th>
<th>1910</th>
<th>1920</th>
<th>1928</th>
<th>1935</th>
</tr>
</thead>
<tbody>
<tr>
<td>Single-family dwellings</td>
<td>21%</td>
<td>70%</td>
<td>19%</td>
<td>81%</td>
</tr>
<tr>
<td>Apartments</td>
<td>6%</td>
<td>9%</td>
<td>49%</td>
<td>--#</td>
</tr>
<tr>
<td>Duplexes</td>
<td>66%</td>
<td>15%</td>
<td>25%</td>
<td>16%</td>
</tr>
<tr>
<td>Stores, Apt., etc.</td>
<td>7%</td>
<td>6%</td>
<td>7%</td>
<td>3%</td>
</tr>
</tbody>
</table>

# Not a single apartment building has been built in the last four years.

All urban building conformed to a loose, unregulated, haphazard plan, and cities like "Topsy", "just grew up."

Stores and business places fronted on through streets. Factories spread along railway right-of-ways or sidings. Zoning and building restrictions were loosely and periodically passed by the city council according to Class A, B, and C, residential areas, and light and heavy manufacturing districts. Outside of that, it had no control over the size, shape, design or value of any improvements or buildings erected. Each landpurchaser or owner did with his own frontage what he pleased, so long as he created no objectionable nuisance, and in all cases he spent money on his real estate for only one motive—profit. Subdividers of newer residential districts placed minimum amounts, usually $5,000 and upwards that must be spent in erecting a home. Such neighborhoods with building restrictions today are gems in

(4) City of Milwaukee Reports, 1935, Page 63.
city planning, especially when considered as having resulted from individual initiative. But the older neighborhoods, nearer the center of the city, are rapidly deteriorating and decaying with age, with little incentive existing to repair, maintain, or improve these older properties. Here no one believes in the upkeep of his property because his neighbor does not believe in maintaining his property in a decent state of repair. Here houses soon become converted to other uses, as rooming houses, antique shops, restaurants, or have stores built on the front of them. Undesirable peoples move in and such an area of formerly good homes quickly becomes "blighted" and stripped of its beauty. Most every neighborhood which is not a slum or a modern residential district, can be either put into, or bordering on, this class designated with the term, "blight."

What, then, is the Housing Problem? It can be divided into four parts: 1) An actual shortage of living units themselves, over six million. 2) Actual slum areas with crowded obsolete tenements of the "old law" and "new law" variety such as you have in New York City. 3) Blight neighborhoods, bordering on the condition of a slum area or advancing to that stage. 4) Protecting real estate and existing residential areas, as well as new districts from cheap building and trends that will make them in time fall into blight areas or slums. The future expansion of cities must be planned instead of being brought by haphazard growth and decay.
At the outset, let it be understood, that this thesis will deal with housing as strictly an urban problem. True, farm housing is in most cases antiquated, if not deplorable, but the solution to that problem is most closely interwoven with farm income and the farm problem. It is the housing of the non-farm income group, the office clerk, factory hand, struggling small business man, government employee, the unemployed, the relief and W.P.A., worker, and casual laborer that we are concerned with.

To show with statistics an actual shortage of housing units, the F. W. Dodge reports, and the United States Census give us these figures:

<table>
<thead>
<tr>
<th>Year</th>
<th>Population</th>
<th>Increase in Apts., required for 40 hrs. old</th>
<th>Total Rebuilding in pop. houses over 40 yrs. old</th>
<th>Total Dwellings erected 750 sq. ft. per apartment, 7 1/2 percent deducted from Dodge figures as alteration and repairs.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1923</td>
<td>69,221,253</td>
<td>1,411,432</td>
<td>352,884</td>
<td>452,644</td>
</tr>
<tr>
<td>1924</td>
<td>70,632,685</td>
<td>1,411,432</td>
<td>352,884</td>
<td>441,485</td>
</tr>
<tr>
<td>1925</td>
<td>74,075,072</td>
<td>1,500,132</td>
<td>380,033</td>
<td>468,502</td>
</tr>
<tr>
<td>1926</td>
<td>76,498,204</td>
<td>1,520,132</td>
<td>380,033</td>
<td>478,082</td>
</tr>
<tr>
<td>1927</td>
<td>78,013,556</td>
<td>1,520,132</td>
<td>380,033</td>
<td>487,583</td>
</tr>
<tr>
<td>1928</td>
<td>79,533,468</td>
<td>1,520,132</td>
<td>380,033</td>
<td>497,084</td>
</tr>
<tr>
<td>1929</td>
<td>81,055,800</td>
<td>1,520,132</td>
<td>380,033</td>
<td>506,585</td>
</tr>
<tr>
<td>1930</td>
<td>82,575,752</td>
<td>1,520,132</td>
<td>380,033</td>
<td>516,086</td>
</tr>
<tr>
<td>1931</td>
<td>84,095,864</td>
<td>1,520,132</td>
<td>380,033</td>
<td>525,587</td>
</tr>
<tr>
<td>1932</td>
<td>85,615,986</td>
<td>1,520,132</td>
<td>380,033</td>
<td>535,087</td>
</tr>
<tr>
<td>1933</td>
<td>87,154,128</td>
<td>1,520,132</td>
<td>380,033</td>
<td>544,588</td>
</tr>
<tr>
<td>1934</td>
<td>88,654,260</td>
<td>1,520,132</td>
<td>380,033</td>
<td>554,080</td>
</tr>
</tbody>
</table>

Total: 10,493,581
Under Production: 8,675,492 units

The assumption in these reports are, 1. Uniform increase in population. 2. One dwelling for a family of 4 persons. 3. 750 square feet per apartment, and 4. 7 1/2 percent deducted from Dodge figures as alteration and repairs. (5)


(6) opus cit., Page 170-72.
This does not mean that 6,675,492 families are existing out in the open, in tents, on the street, or in caves, but are on the other hand living doubled-up with other families, or in dwellings over 40 years old, substandard, antiquated, and so much in need of repair as to be unhabitable in the light of standards of today.

A real picture of existing units, and the failure of building construction to keep pace, in recent years, with housing needs, is shown in the Inventory of Real Property, as observed by Nathanael H. Engle, Assistant Director, Bureau of Foreign and Domestic Commerce, United States Department of Commerce. He states:

"The typical American home, taken as a composite of all American dwellings, is a single-family dwelling about 19 years old, wood or frame construction, containing five rooms. It is equipped with indoor plumbing, electricity and gas. Stove heat predominates, with only 31% having a central warm-air heating plant. 30% of all such units were single-family homes, though 13% were duplexes and 8 percent multi-family homes. However, in Cleveland, Ohio, a city of more than a million inhabitants, 41.5% were single-family houses, 28.8 duplexes and 29.7 percent included apartments, row houses, or terraces. But again National Figures showed that 18% of all homes were built 20 to 30 years ago, 22% from 30 to 50 years, and 8% more than 50 years of age. So actually only half of all American homes are 19 years old or less. Redrawing the ages of homes, we find:

7% of all structures are less than 5 years old.
20% are 5 to 10 years old (including 1928-29 boom housing).
25% are 10 to 20 years old (prosperity housing).
18% are 20 to 30 years of age (pre-war housing).
22% are 30 to 50 years of age.
8% are over 50 years old."
With the lack of new dwelling units provided in proportion to need, we find our chief concern in the housing problem, next to an actual shortage, the 36% of our dwellings, fully over one-third, which are over 30 years of age. These form our actual "slum" neighborhoods. They are the old tenements (a minority outside of New York City), small wooden houses, mostly without basements, where our cities expanded 40 years ago, frame multi-family apartments and tenements of the plainest architecture, the smoked, unpainted, homes of the poorer workers near factory districts, and the oldest-style unimproved two-story family homes. Here there is no incentive to maintain or repair in these districts, as no one would erect a costly new house among such old surroundings.

A few modern apartments, easily accessible for people who work in downtown areas may spring up, but their height, high rentals, and ability to meet existing demands prevents these buildings from taking over the entire neighborhood, and replacing the shacks they overshadow.

The secondary concern of housing students is the 18% homes that are twenty to thirty years of age, as well as the 25% of newer prosperity housing that is in, or is approaching, neighborhoods known as "blight" areas. Edith Elmer Wood describes this problem very accurately:

"The best known type of blight neighborhood and slum, however, and certainly the type that is growing fastest, is that of mixed occupancy near the business center of the city, the neighborhood which has seen better days, which originally contained residences of good type. As business crept in and
changed its character, the original residents moved further from the center in search of space, quiet, and gardens. Single-family houses were split up into apartments or became rooming houses. Here and there one would be used for offices, or shops—makeshift uses in either case, for which the buildings were not adapted. A business or industrial building has gone up here or there, but the expected transition to business or industrial use has never been completed.

"Meanwhile the owner and the assessor have agreed to put high valuations on this land, not because of its present use or the income derived from it, but because they believe that it is destined, sooner or later, with the growth of the city, to be in demand for high grade business, on account of its proximity to the center of the town.

"Until a few years ago, our cities grew so fast that this expectation seemed fairly warranted. Owners, mortgage holders, and real estate operators are awakening now to wholly different conditions. When immigration stopped, the spectacular growth of our cities stopped with it. In addition to which the birth rate is continuously falling. The drift from the farms to the cities seems to have turned in the other direction, and the development of skyscrapers has tended to a vertical rather than a horizontal expansion." (7)

Miss Bauer of the Labor Housing Conference of Philadelphia, speaking of the American Home, says:

"It never dies. It is always 'handed down', when the substantial middle-class family for whom the dwelling was built moves out into the newer fringe of suburbs. Nothing is amortized; no adequate allowance is made for depreciation or repairs. The taxes remain the same, and the handed-down dwelling is likely to have two families living where one lived before, and it is more than likely to be in disrepair. The neighborhood becomes "rundown", then definitely "blighted", and finally an outright "slum". " (8)

Miss Bauer was followed with the testimony of the Rev.

(7) Slums and Blighted Areas in the United States. Pages 17-18
(8) Hearings before Senate Committee on Education and Labor, June 4-8, '35. Page 89.
Dr. John O'Grady, Dean of the Catholic School of Social Work; President National Conference of Catholic Charities; Vice President National Public Housing Conference:

"I have noticed in different cities in the country that to an increasing degree our slum areas are deteriorating rapidly year by year. In a few years they are going to become wildernesses. Then there is the tendency constantly to increase and to expand the slum areas. . . . . . . And it is not going to solve the housing problem merely to erect a few blocks of houses here and there through the city. A housing program must be the future of a real program for city planning." (9)

Shortage of new units, and unfitness of over half of existing units, then, is the Housing Problem. As final pictorial proof, are these photographs taken in a large Great Lakes City. One shows shacks in which people live, in the First Ward, only a few blocks from expensive Lake Drive property. Another pictures old cottages on an alley street behind a great shoe factory. A third shows Italian flats crowded together in the Third Ward, a Fourth is that of a tinder-tenement with stores tacked on in front, in the Second Ward.

North Pulaski Street, Milwaukee, Wisconsin

(9) Opus cit., Page 95-96.
North Killian Place
Milwaukee, Wis.

Family noises, crowded bedrooms, and odors closely united in the Third Ward

A Three-Story, red brick Tenement
The nature of ill-housing has been rather fully explained. Its extent in different cities of this country is equally astonishing. The tenement conditions and vertical mode of living in costly Manhattan of New York has already been shown in an earlier description of the "dumb-bell" apartments. As the city could extend only North, vertical expansion was the only way possible. But, when bridges, tunnels, and underwater subway trains made possible the moving of populations and workers quickly to distant homes in Brooklyn, the Bronx, and Queens, and opened up those areas to building, we find the following comparison between acreage and population:

<table>
<thead>
<tr>
<th>Borough</th>
<th>Area in acres</th>
<th>Population</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manhattan</td>
<td>14,038</td>
<td>1,867,312</td>
</tr>
<tr>
<td>Queens</td>
<td>69,075</td>
<td>1,079,129</td>
</tr>
<tr>
<td>Brooklyn</td>
<td>45,444</td>
<td>2,560,401</td>
</tr>
<tr>
<td>Richmond</td>
<td>36,500</td>
<td>158,346</td>
</tr>
<tr>
<td>Bronx</td>
<td>26,524</td>
<td>1,265,258</td>
</tr>
</tbody>
</table>

"Brooklyn, an independent community, has its own slum problem, as a result of migrations from Manhattan, and partly of the growth of manufacturing and shipping. The Bronx was built up mostly after the worst types of housing were outlawed. The Queens, unfortunately, developed in some districts a monotonous series of cheap housing." (10)

This is the situation in Greater New York where the greatest concentration in population exists. Housing in different cities varies according to climate, topography, social conditions, and materials. In Washington, D.C., a great condemnation of buildings and their razing has taken place to carry out the building program of new government

buildings. Nevertheless, across the street from these new structures, are still the worst type of housing, behind the owner-occupied (50.7%). In 1920 it had been 32.8% especially after the war, was due to high rents.

Due to the peculiar hub plan of the city streets, large irregular blocks have small brick homes on the alleys where the negro population is housed. These, as black as their inhabitants, are forever the object of reformists and city planners.

"Chicago is a much younger city than New York. Its old tenements are neither so old nor so numerous nor so standardized as those of New York and Manhattan. They are largely frame structures rather than brick, and of 2 or 3 stories instead of 4, 5, or 6. No natural barrier to the city's spreading existed to north, west, or south, as was the case with early New York on Manhattan Island. Many similarities are noted. Both cities are adversely affected by the deep, narrow lot—25-foot frontage, and 125-foot depth or thereabouts. Chicago did not develop the inordinately deep buildings to cover it. But in the low-rental sections, owners built closely to the lot line on each side, and as taxes rose, put a rear house at the foot of the lot, and sometimes a middle one between.

"Dr. Edith Abbott, Graduate School of Social Service Administration, University of Chicago, studied 23 areas in Chicago and found that there was great stagnation in blight areas. Private enterprise is dead. Hardly any new buildings go up, hardly any old buildings are demolished. Those which are there receive the minimum of repairs and become progressively worse. The only point in which improvement has taken place during the quarter century just passed, is the diminished population after immigration was checked. There have been population losses in all the downtown blighted areas which fringe the Loop." (11)

"Philadelphia has avoided some of the housing troubles of other cities by keeping its buildings low and its outlying areas accessible. Its land values have not reached the exaggerated height of some other cities. It has a high proportion of

home ownership, but also, unfortunately, a high rate of foreclosures. At the time of the 1930 census, more than half of Philadelphia homes were owner-occupied (50.7%). In 1920 it had been 38.8% and in 1910, 25.4%. Much of this rapid increase, especially after the war, was due to high rents, housing shortage and high pressure salesmanship, and was essentially unsound. Foreclosures have been excessive long before the depression. They have become tragic since. (During the past 5 years, 47,062 sheriff's writs have been issued in Philadelphia, as to 39,543 in the preceding 26 years.)

"The worst conditions are found in the courts and alleys in the center of blocks in the older parts of the city. Wretched little brick houses, sometimes built back-to-back (sharing a party wall in the rear) are crumbling with age and neglect, have wholly inadequate light and air around them, and are to a large extent dependent on outdoor toilets shared with several other families, and on water carried from the nearest hydrant. About 60,000 persons live in these court and alley houses." (12)

Detroit's problem is the rapid growth of the city and extensive use of frame construction. Homes of mechanics who have moved into better suburbs, but kept their old residences for investment purposes and for renting to newer immigrants, now form "blighted" neighborhoods, invaded by business and industry, dust and noise. Its 120,000 Negro population is no better houses, in the eastern blighted area.

Cleveland, statistically minded city, decided in 1933, that one-third of its dwellings occupied blighted areas around the business district with a population of over 300,000 and needed demolition; that these areas could be re-planned and rebuilt at an estimated cost of $285,000,000. Fire protection for this district cost $54.00 per parcel of land, compared to $4.00 for the suburbs.

Baltimore, like Philadelphia and Washington, has a high percentage of home-owned family units, though in the form of single row houses. Pittsburgh, through its Housing Association in 1933, made this statement of its Hill district:

"Here is Pittsburgh's greatest liability area. It has other liability areas, but they are smaller. Here in these obsolete dwellings are housed the greatest number of those who make demands upon the community for relief. Here is the greatest center of crime and immorality. Here are massed the controlled voters. Here, then, is an area that is ripe and rotten ripe for reconstruction." (13)

Milwaukee, in a study of its Housing Problem, in January 1933, found the real cause of "blight areas" as well as its definition:

"Our city growth has been characterized by a process of people climbing over each other from the center toward the outskirts until the near-central portions have been left semi-depopulated, not needed for business, and unfit for decent housing. In view of the decreasing rate of population growth, this process cannot go on long without creating large central areas which will not even return to the city sufficient revenue to maintain actual utilities, to say nothing of the numerous other costs of government. A condition of this process of decentralizing population means economic death for our cities." (13)

In its Negro district, the following facts were found regarding the buildings in which the colored population were housed.

"Over 75 percent of the buildings have long passed the age of 40 years at which frame buildings are computed to have depreciated to zero. A high percentage of dwellings in this district are ready for condemnation because of structural deficiencies which can generally be rectified without rebuilding, to only a very small degree." (13)

(13) Edith Elmer Wood, Slums and Blighted Areas in U.S. Pages 60-63.
New Orleans, Cincinnati, Minneapolis, and Indianapolis have similar experiences with old blight areas being a great financial burden on the rest of the city, in comparison of municipal services required. Housing in the West and Florida are of comparative new and sound origin, but nevertheless, San Francisco has the problem of inside rooms, Sacramento, that of cellar dwellings, and Fresno, that of "shacks."

Nor is the housing problem confined only to our larger cities. In Muncie, Indiana, a typical "Middletown" which was studied by two New York sociologists, Robert and Helen Lynd and who coined that word, we find this description:

"Single-family houses, 'the characteristic midland house set in its own yard', provide shelter for 80% of Muncie's families. Over 90% are made of wood. Some 47% have no running water; or only cold water in the house, 38% no bathtubs, 19% no indoor toilets, 55% only stove heat. Most of them have run down in recent years, including the cheaper built town-dwellings on the subdivisions. Among these are rows of plain stuccoed houses, where the outer plaster has cracked away exposing the laths underneath, and with a single front second story window. Depression years have made them shabbier, and the soiled faces of the children playing around them are no different than the smoky exteriors of the houses themselves." (14)

The architectural picture of housing has been shown with its deterioration and extent, but the social side of the question and the effects that different antiquated housing districts have upon the public record of health, delinquency, and crime in comparison with newer, more intelligently planned and well kept neighborhoods, is yet to be revealed.

(14) As reported in Life Magazine, May 10, 1937, Pages 16 ff.
Taken from Public Health Reports, released Nov. 2, 1934, and compiled by Hollo H. Britten, Senior Statistician, United States Public Health Service, we find that in three different geographical zones in Detroit, Michigan, the following table has been compiled: (15)

<table>
<thead>
<tr>
<th>Average number of persons per room</th>
<th>Infant deaths per 1000 births</th>
<th>Death rates per 100,000 pop.</th>
<th>Deaths from all causes per 1000</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>0.9 or more</td>
<td>86</td>
<td>132</td>
<td>113</td>
<td>22</td>
</tr>
<tr>
<td>0.8</td>
<td>69</td>
<td>79</td>
<td>87</td>
<td>17</td>
</tr>
<tr>
<td>0.7</td>
<td>62</td>
<td>52</td>
<td>77</td>
<td>18</td>
</tr>
</tbody>
</table>

"In Cleveland, Ohio, "states the same bulletin, "it was found that on the basis of monthly rentals paid, the death rate was 15 per 1,000 population in the lowest of the 12 areas charted, to 7.2 per 1,000 population in the highest economic area. Rents ranged from $20 to $75 per month. Most of the mortality occurred below $40 per month." (16)

In Cleveland, Ohio, again, a certain slum area containing only 2.5 of the population was examined, and found to produce the following statistics from the police records:

<table>
<thead>
<tr>
<th>Condition</th>
<th>Cleveland</th>
<th>The section</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number</td>
<td>Number</td>
<td>Percent</td>
</tr>
<tr>
<td>Population, 1930</td>
<td>900,429</td>
<td>22,236</td>
</tr>
<tr>
<td>Crime, murders (in 12 years)</td>
<td>998</td>
<td>213</td>
</tr>
<tr>
<td>Vice, houses of prostitution</td>
<td>373</td>
<td>93</td>
</tr>
<tr>
<td>Delinquency, boys</td>
<td>6,614</td>
<td>447</td>
</tr>
<tr>
<td>Illegitimate births</td>
<td>293</td>
<td>31</td>
</tr>
<tr>
<td>Tuberculosis deaths</td>
<td>3,127</td>
<td>392</td>
</tr>
</tbody>
</table>

(15) Public Health Reports, Vol. 49, No. 44. Page 1302
(16) ibid. Pages 1302-03.

(17) Edith Elmer Wood: Slums and Blighted Areas in U. S. Pages 51-52.
"Naturally the relief load is high in this section," says Edith Elmer Wood, "but it would be unfair to lay this to the bad housing. On the contrary, families of depleted income, on the way to needing relief, naturally gravitate to areas of bad housing because the rents are low. In 1931 9 Cleveland families out of every 100 were receiving relief, and in 1932, 15.9. In the slum area studied the percentages were 32.4 for 1931, and 54.5 a year later." (17)

Municipal costs of maintaining slum areas and the consequent economic drain on city governments cannot be overlooked. Their tax load cannot be denied, and is also proven by the fact that unannexed newer-built suburbs which offer their citizens every municipal service in a most elaborate manner, still have from $5.00 to $8.00 per $1,000 assessed valuation cheaper tax rate.

The slum areas do cost cities money. Police officers must expend their efforts on the congested buildings of an old neighborhood and its breeding places of contempt for law. Fire protection because of the tinder-like structures must be trebled. Health officials must concentrate their services upon these districts where disease and deaths rate highest per capita and sunlight has no chance of promoting health. And at the same time, families on relief are most numerous in these districts, and cities must pay their rent. So we find that governments are subsidizing and supporting these deplorable slums with rent checks.

There are broader economic elements to be considered in Housing, that of the Consumer--the person housed--and his

(17) Edith Elmer Wood: Slums and Blighted Areas in U. S. Pages 51-52.
ability to pay, the cost of providing new housing itself, and the position of the investor or person who must furnish new housing, if it is to be provided for under our system of private enterprise. First Consideration is the American family income. Though it is considered to be of the highest standard in the world, we will find that the earnings of the greater portion of American bread-winners is comparatively small when spread over an average of several years. The United States Department of Labor, Bureau of Labor Statistics, charts the income per family, of the 1929 non-farm population, and in it we find that 35.37% of the population, in the most prosperous times had an income less than $1100. 37.35% fell in the group earning from $1200 to $1800. 27.23% earned in excess of $1800. In 1934, the picture changed. 66.55% were earning below $1100, of those employed in Industry. Of total families, 53.37% were earning below $1100. 22.27% were earning from $1200 to $1800, while 24.36% of the total population earned in excess of $1800, but not such high amounts above this figure as they did in 1929. (18)

Charted, the above figures appear: (Each represents 1,000,000 families) (18)

<table>
<thead>
<tr>
<th>Annual Family Income (non-farm)</th>
<th>1929 as 1954 dollar</th>
</tr>
</thead>
<tbody>
<tr>
<td>Over $1700</td>
<td>IIIIIII</td>
</tr>
<tr>
<td>$1500 - $1700</td>
<td>IIII</td>
</tr>
<tr>
<td>$1200 - $1500</td>
<td>III</td>
</tr>
<tr>
<td>$1100 - $1200</td>
<td>III</td>
</tr>
<tr>
<td>$1000 - $1100</td>
<td>III</td>
</tr>
<tr>
<td>Below $1000</td>
<td>III</td>
</tr>
</tbody>
</table>

(18) As reported in Slum and Low-Rent Public Housing, Hearings before Senate Committee on Education and Labor on S. 2392, June 1955. Pages 63-64.
Leon M. Gurda, Inspector of Buildings of Milwaukee, before the Milwaukee Housing Conference, Plankinton Hotel, Oct. 16, 1937, reports that:

"On Wisconsin Income Tax Returns from Milwaukee County in 1935, 80, 260 or 39.82 percent of the total had incomes from $0 to $999, and that another 93,547 individuals, or 46.41 percent of the total had incomes from $1000 to $1,999. Only 13.77% had incomes in excess of $2,000 for 1935." (19)

If, then, advisors in domestic relations and family expenses, and the budget books handed out by banks to the American family state that no more than one-fourth of income can or should be paid for rent, how can 39.82% of the families in Milwaukee County alone pay in excess of $21.00 per month for rent, and another 46.41% more than $22.00 to $37.50 monthly? Can new construction, whether small apartments, row houses, cottages or duplexes, meet these monthly rentals that 76% of the people can pay, and no more? Not if we examine construction costs.

The recognized cost and value of any modest new single-family home is $7500.00.

Land (50-foot lot, with improvements, water, sewer, gas, and paved street, averages .............................. $2500.

House, average size, durable construction and with conveniences .............................. $5000.

(Plumbing, water, sewer, gas, and paved streets, by 20%)

An investment of $7,500 is made. At least 20% (now 10%) is required to pledge the ownership of a home. Interest, taxes, payments on the principal over a 20-year period, can be secured at 1% per month, or $75.00 now under a "FHA" loan.

But who with total monthly income just above that amount can afford such payments? In constructing a duplex, the extra story can be added for only 1/3 more, about $3,000, to reduce the average cost of each dwelling unit. The cost of apartment houses or row dwellings never has fallen far below $1,000 per room, even on large cooperative projects. The average apartment is 3-rooms, the bathroom not being counted.

Many economists and social workers point out that the real cause of our housing problem, and inability of new construction to keep up with needs, is the character of our construction methods and the high cost of new homes and buildings themselves. Two authors, Miles Colean and Guy Greer term the present method of house-building "medieval" when they gave the following description:

"The pattern of the construction industry was pretty well set before the industrial revolution. It has not essentially changed. Carpenters and bricklayers and stonemasons today go to work to build a house in just about the same way they set about the job two hundred years ago. During a period when every other important manufacturing process was undergoing a thorough adaptation to capitalistic and industrial technics, building remained a localized, handicraft process. Long after the days were past when the neighboring woods could be depended upon for lumber and the native hills for brick-clay and stone—even after the time had come when the house contained almost as much machinery as a ship—the construction industry remained, and still remains, as it was before the first steam engine, an industry turning out a hand-made product. It is a product assembled by a group, now an every-increasing group of specialists—electricians and plumbers, metal workers and woodworkers, plasterers and paperhangers, all acting with jealous independence of one another. This crew is feebly co-ordinated by one of its number acting in the capacity of "general contractor." And all of them must deal on a retail basis with a horde of material and
equipment dealers standing between them and the producers of the material and equipment which they must buy. (20)

The above authors point out that the pre-fab house, and building by mass production is a step in the right direction, in reducing the cost of a dwelling below $4,000 to $5,000 that it requires today, plus the value of the lot or real estate upon which it stands.

Investors in real estate are chiefly single home owners, home owners residing in a duplex and renting out the upper or lower floor, absentee owners, individual mortgage lenders whose only concern is the 3 to 6% interest they are paid on their principal, building and loan associations which are really mortgage holders with amortized interest and principal payments, and bond-holders of large multi-family units or apartments.

Any building, to have a set of "balanced books" must realize 1% per month on the total investment or 12% gross, per annum, and 20% gross per annum in the case of heated rooms, and janitor service. Analyzed, this cost is per year of the total investment:

- Real estate taxes approximate 3% (special assessments not inc.)
- Water and insurance 1%
- Repairs and painting 2%
- General depreciation (obs.) 2%
- Vacancies, overhead, maintenance 1%
- Interest and net return only 3% or less on investment.

Apartments must allow an additional 8% gross of the total investment for fuel, management, and janitor wages. If a

(20) Facing the Facts on Housing, Harpers Mag., Mar. 1937. Page 421
person by liberal federal credit can now secure a place at 1% per month, within 20 years, how can private investors compete and take the risks and inconvenience of looking after their investments continually. Only the high rentals obtained by new modern structures for a few years after their completion have attracted these investors.

The only field left for one who wishes to invest in real estate and still secure a lucrative return, is he who purchases at a reasonable figure older types of buildings where the structure has not gone into decay nor the neighborhood too unattractive to people of moderate means. By remodeling, to include additional dwelling units, installing modern lines and newer plumbing and electrical fixtures and new woodwork, a better class of tenants will be attracted to these "new" places. An illustration below shows what can be done with an older two-story house with new sidings and windows, compared to the house of the same architecture and period, but unimproved alongside.

What Remodeling Can Do.

Compare corner property with its former "twin" next door.
Actual figures of another investor in a large mid-western city are shown here. In 1910, the party obtained 100 feet of frontage in a new and part old neighborhood, containing two meager cottages and one old-style flat with one front entrance. The purchaser moved the two cottages to the rear, and remodeled the older flat. The 100 feet was divided into three, 33 1/3 foot lots. Two large flats were erected and completed just prior to the war and the rise of high prices, financed mostly by mortgages at high interest and renewal rates. Only the high rentals after 1920 enabled the owner to repay his mortgages before the depression of 1929, as well as remodel the cottages and older flats with bathrooms, porches, basements and interior changes. An additional fact is that the owner is himself a building mechanic and much of the work, repairing, and maintenance was done by himself, as well as improvements made by him during the winter months of temporary unemployment without expense to him. Gross income, Assessed Valuation, Tax and Expense Figures are shown here-with, as well as 2½% depreciation on buildings (not land) which is allowed by the State Income Tax Dept. All figures are actually taken from income tax blanks. From the 23 year period considered, the rent of the rear cottages ranged from $18 to $37, and are now bringing $25, per month (1938). Newer three-bedroom duplexes ranged from $20 to $55 in income, now bringing $30, while the older flat yielded $20 to $36 in income, now bringing $30, the same as the more modern and larger duplex next to it.
Property "A"
(One rear cottage, 5 rooms and bath, and furnace)
(Duplex in front, hot water heat, 3 bedrooms in each unit)
Valuation, $1400 land, $4800 improvements. Total taxable, $6200.
Replacement, $12,000.
Assessed, 1915, only $4100.

<table>
<thead>
<tr>
<th>Year</th>
<th>Gross Income</th>
<th>Taxes</th>
<th>Insurance</th>
<th>Expenses</th>
<th>Income</th>
</tr>
</thead>
<tbody>
<tr>
<td>1915</td>
<td>$585.50</td>
<td></td>
<td></td>
<td></td>
<td>$282.11</td>
</tr>
<tr>
<td>1921</td>
<td>1326.00</td>
<td>164.21</td>
<td>54.45</td>
<td>215.58</td>
<td>769.18</td>
</tr>
<tr>
<td>1929</td>
<td>1596.00</td>
<td>217.17</td>
<td>59.00</td>
<td>490.64</td>
<td>676.69</td>
</tr>
<tr>
<td>1933</td>
<td>700.00</td>
<td>211.01</td>
<td>10.00</td>
<td>300.00</td>
<td>400.00</td>
</tr>
<tr>
<td>1937</td>
<td>1084.00</td>
<td>207.04</td>
<td>15.50</td>
<td>249.75</td>
<td>492.71</td>
</tr>
</tbody>
</table>

2½% depreciation deducted annually, approximately $120.00

Property "B"
(One rear cottage, over 75 years, but improved)
(Remodeled small flat in front, hot water heat, 2 bedrooms)
Valuation about $5400 to $5,000. Replacement $8,000.

<table>
<thead>
<tr>
<th>Year</th>
<th>Gross Income</th>
<th>Taxes</th>
<th>Insurance</th>
<th>Expenses</th>
<th>Income</th>
</tr>
</thead>
<tbody>
<tr>
<td>1915</td>
<td>544.00</td>
<td>65.06</td>
<td>9.00</td>
<td>111.00</td>
<td>300.94</td>
</tr>
<tr>
<td>1921</td>
<td>801.00</td>
<td>112.06</td>
<td>---</td>
<td>424.82</td>
<td>204.22</td>
</tr>
<tr>
<td>1929</td>
<td>1196.00</td>
<td>135.00</td>
<td>20.85</td>
<td>503.48</td>
<td>451.67</td>
</tr>
<tr>
<td>1933</td>
<td>600.00</td>
<td>151.88</td>
<td>10.00</td>
<td>180.00</td>
<td>215.62</td>
</tr>
<tr>
<td>1937</td>
<td>227.00</td>
<td>130.24</td>
<td>10.00</td>
<td>250.45</td>
<td>425.81</td>
</tr>
</tbody>
</table>

2½% depreciation deducted annually, approximately $62.50

Property "C"
(Modern 3 bedroom duplex. Three car garage)
Income and expense figures have been halved, as owner lives in one duplex. Valuation, $4200 to $6400. Replacement $10,000.

<table>
<thead>
<tr>
<th>Year</th>
<th>Gross Income</th>
<th>Taxes</th>
<th>Insurance</th>
<th>Expenses</th>
<th>Income</th>
</tr>
</thead>
<tbody>
<tr>
<td>1915</td>
<td>392.00</td>
<td>101.52</td>
<td>11.25</td>
<td>103.00</td>
<td>50.25</td>
</tr>
<tr>
<td>1921</td>
<td>365.00</td>
<td>158.00</td>
<td>20.00</td>
<td>108.62</td>
<td>152.13</td>
</tr>
<tr>
<td>1929</td>
<td>620.00</td>
<td>224.59</td>
<td>47.00</td>
<td>227.17</td>
<td>354.27</td>
</tr>
<tr>
<td>1933</td>
<td>590.00</td>
<td>211.01</td>
<td>39.00</td>
<td>86.00</td>
<td>54.00</td>
</tr>
<tr>
<td>1937</td>
<td>457.00</td>
<td>215.72</td>
<td>14.06</td>
<td>419.16</td>
<td>211.86</td>
</tr>
</tbody>
</table>

Depreciation, about $125.00 annually.
Expenses as exterior painting and new roofs were not redvided over the different years for a true average. Note how older Prop. B earns now more than "A".

Total, all properties "A", "B", and "C"

(Assessed Valuation, $14,500 in 1915 to $16,00 in 1929)

<table>
<thead>
<tr>
<th>Year</th>
<th>Value</th>
<th>Income Earnings</th>
<th>Value Earnings</th>
<th>Value Earnings</th>
<th>Value Earnings</th>
</tr>
</thead>
<tbody>
<tr>
<td>1915</td>
<td>$1521.50</td>
<td>267.22</td>
<td>20.25</td>
<td>514.10</td>
<td>$613.30</td>
</tr>
<tr>
<td>1921</td>
<td>2491.00</td>
<td>454.06</td>
<td>61.93</td>
<td>749.02</td>
<td>1039.04</td>
</tr>
<tr>
<td>1929</td>
<td>5412.00</td>
<td>547.67</td>
<td>106.85</td>
<td>1573.46</td>
<td>1462.83</td>
</tr>
<tr>
<td>1933</td>
<td>1690.00</td>
<td>555.90</td>
<td>59.00</td>
<td>416.00</td>
<td>662.62</td>
</tr>
<tr>
<td>1937</td>
<td>2458.00</td>
<td>551.00</td>
<td>39.56</td>
<td>893.56</td>
<td>1198.38</td>
</tr>
</tbody>
</table>

Average net annual earnings, $996.59
Properties

"A", "B", and "C"

Rear View

Showing the two cottages and slightly crowded condition.

(The House in background is not in estimates).

<table>
<thead>
<tr>
<th>Itemized</th>
<th>Cape Cod</th>
<th>Anchorage</th>
<th>Belfast</th>
</tr>
</thead>
<tbody>
<tr>
<td>Catalog price</td>
<td>$1300.00</td>
<td>$8475.00</td>
<td>$8193.00</td>
</tr>
<tr>
<td>Plumbing system</td>
<td>201.00</td>
<td>310.00</td>
<td>251.00</td>
</tr>
<tr>
<td>Heat</td>
<td>167.00</td>
<td>226.00</td>
<td></td>
</tr>
<tr>
<td>Heating System</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hot Air</td>
<td>151.00</td>
<td>274.00</td>
<td>262.00</td>
</tr>
<tr>
<td>Hot Water</td>
<td>289.00</td>
<td>419.00</td>
<td>391.00</td>
</tr>
<tr>
<td>Electric Wiring</td>
<td>52.00</td>
<td>74.00</td>
<td>65.00</td>
</tr>
<tr>
<td>Electric Fixtures</td>
<td>32.00</td>
<td>43.00</td>
<td>41.00</td>
</tr>
<tr>
<td>Screens &amp; Storm Sash</td>
<td>91.00</td>
<td>144.00</td>
<td>105.00</td>
</tr>
<tr>
<td>Asphalt Strip Shingles</td>
<td>44.00</td>
<td>87.00</td>
<td>39.00</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>$3286.00</td>
<td>$3795.00</td>
<td>$3313.00</td>
</tr>
</tbody>
</table>

Homes and pre-fabricated houses can be obtained from private enterprise, while liberal aid (Federal Housing Administration) loans have many of our stimulated individuals have for years been building several, and skeletonization and skeleton methods. All bone and structural parts are pre-fabricated so they can be erected together like the steel skeletons of a skyscraper.
What steps, then, have been made in furnishing better housing to the great mass of the population? The first step is the actual progress that has so far been made in extending the range of home ownership to a larger circle of American families, by cheaper costs and by better financial aid. Improved methods of construction, the substitution of steel and concrete for wood, simplified units, ready-cut homes and pre-fabricated houses have resulted from private enterprise, while liberal FHA (Federal Housing Administration) loans have made these available to people and greatly stimulated individual home building.

Sears Roebuck & Co., large mail order firm, have for years been advertising and selling "Ready-Cut" Homes, of several standard models, all catalogued and cut, planned, and shipped ready for assembling by mass-production methods. All boards and pieces are cut, fitted, and numbered so they can be erected together like the steel skeleton of a skyscraper.

The Total Cost of several types of residences, not including shipping, assembling and labor costs are:

<table>
<thead>
<tr>
<th>Itemized</th>
<th>Cape Cod</th>
<th>Lynhaven</th>
<th>Belfast</th>
</tr>
</thead>
<tbody>
<tr>
<td>Catalog price</td>
<td>$1200.00</td>
<td>$2475.00</td>
<td>$1733.00</td>
</tr>
<tr>
<td>Plumbing system</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Best</td>
<td>201.00</td>
<td>310.00</td>
<td>281.00</td>
</tr>
<tr>
<td>Modest set</td>
<td>167.00</td>
<td>220.00</td>
<td></td>
</tr>
<tr>
<td>Heating System</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hot Air</td>
<td>151.00</td>
<td>274.00</td>
<td>262.00</td>
</tr>
<tr>
<td>Hot Water</td>
<td>269.00</td>
<td>419.00</td>
<td>391.00</td>
</tr>
<tr>
<td>Electric Wiring BX</td>
<td>52.00</td>
<td>74.00</td>
<td>66.00</td>
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<tr>
<td>Electric Fixtures</td>
<td>32.00</td>
<td>42.00</td>
<td>41.00</td>
</tr>
<tr>
<td>Screens &amp; Storm Sash</td>
<td>91.00</td>
<td>144.00</td>
<td>105.00</td>
</tr>
<tr>
<td>Asphalt Strip Shingles</td>
<td>44.00</td>
<td>57.00</td>
<td>39.00</td>
</tr>
<tr>
<td>Total</td>
<td>$2206.00</td>
<td>$3795.00</td>
<td>$3138.00</td>
</tr>
</tbody>
</table>
Cape Cod is the cheapest house obtainable; Lynhaven, the most expensive. See illustrations below.

Price includes hardware, woodwork, exterior and interior paint and varnish, but does not include excavating, landscaping, bricks for fireplace or chimney, cost of building permit, accident or workmen's compensation insurance, nor incidental expenses, but architects' lay-out fees and much time are saved.

Another high quality home striving toward low costs is the "Pre-Fab" House now being developed by the Harnischfeger Corporation of Milwaukee. Pressed sheets of steel are "folded" into joists by huge presses, to which are attached boards of scientifically developed and highly insulated composition further protected by aluminum paint. Metal window frames and casings, and door frames are fitted in, as well as metal stairway treads. Only a minimum of flooring and woodwork are used in the construction. Fireproof and rigid, and
assembled in a few hours, the house threatens to revolutionize housing costs.

"If savings and price reductions have been effected in the automobile trade," asks the manufacturer, "why cannot the same be done in housing?"

The answer is that a house is not a complicated piece of machinery as a car, and pre-fab houses must be erected on a large scale by expert workmen on the sites, as well as turned out in bulk at the factory. Finally, the public is slow to depart from accepted long-time orthodox built homes, to the steel ones, even though the latter are in exterior appearance no different. But quantity-production can reduce manufacturing costs by over $1,000, and will satisfy any home seeking family.

Final step in single home ownership, and of which Ready-Cut and Pre-fabricated home makers have availed themselves of its facilities, is the Liberal Mortgage Provisions of the Federal Housing Administration. Adopted in 1934 by Act of Congress, and providing for the issuance of Mortgage Bonds which builders, purchasers and refinancers of real estate may obtain up to 90% of the value, this service has brought startling results at a time when mortgage activity had sunk to the lowest point in any depression. We learn from the Milwaukee Journal, quoting A. G. Schmedeman, Wisconsin State
"Up to Jan. 1, 1937, FHA mortgages had provided financing for new homes in Wisconsin costing more than $8,000,000. Nearly $4,000,000 FHA mortgages refinanced purchases of existing houses. The FHA has thus carried out in Wisconsin one of its major purposes—to stimulate building and create more employment in the building trades.

"The FHA plan is popular because it provides a simple, certain and convenient way to homeownership. FHA mortgages may run up to 20 years, with monthly payments covering interest, principal, mutual mortgage insurance, and taxes. The one monthly payment covers nearly everything connected with home ownership.

"In building a new home the FHA also provides services that were never before available to the average family. The first point in this service is the examination of plans and specifications to see that the construction conforms to federal housing standards.

"Before the FHA, families building a home had to rely almost entirely on what the contractor told them; there was no outside, disinterested agency to check.

"When the house is under construction, the FHA fieldmen inspect the work at periodic intervals to make certain that it conforms to standards. That is a service not formerly available. The risk rating system for mortgages evolved by FHA experts is the greatest forward step in real estate practice. As they must insure mortgages, they take into consideration, all of the many factors affecting the acquiring of a home, the trend of values in the neighborhood, the credit rating of the prospective owner, as well as the design of the house itself." (22)

A year later, Mr. Schmedeman reports:

"The federal housing administration insuring office in Milwaukee in operation for the entire state of Wisconsin, has established 3,500 families in homes of their own, through $16,000,000 in FHA insured mortgages. 60% of these are for Milwaukee County alone. Of 225,000 single family homes covered, nationally, about 33% were valued at less than $4,000, and monthly mortgage payments $20.00 or less." (23)

(23) ibid., March 13, 1938, Page 15.
The record of the FHA program speaks for itself. Aside from the fact that today it is a large holder of real estate which it has taken back upon defaulted mortgages, it has arrested many homes in the process of decay and prevented many neighborhoods from becoming "blighted." But, even if it has caused one home owner or real estate taxpayer in every block to fix up remodel or build a home, it falls far short of being a general cure-all to the housing problem. It still depends upon private initiative to take advantage of its facilities, and so far private initiative has shown itself a little better than 1%.

From individual attempts to secure better housing, we turn to mass or group attempts, namely large housing projects, model villages, or group houses and apartments, taking in a larger area than one city block. Most known of these are the Garden Homes project, almost twenty years old, Kohler, Wis., a manufacturing town built around one industry, Parklawn and Greendale federally built and subsidized projects, a similar private enterprise, Story Hill Apartments, and different foreign experiments in housing successfully carried out.

The Garden Homes Project, built on the northwest side of Milwaukee, was organized in 1920. It was originally intended to operate as a cooperative enterprise, with all individual homes held by a stock company with shares owned by the owners themselves, but dissatisfaction arising, residents were permitted to purchase their own homes.
single family homes were built, a few joined together, during the acute housing shortage following 1920. A new section of land, 29 acres, was platted, and the homes were erected on a mass production basis. Almost all were built on the same pattern, but were set differently upon the individual lots, sideways as well as frontways, and with differently styled porches and exterior trim so as to disperse monotony. The houses contained living room, dining room, kitchen and bath on the first floor and three bedrooms on the second floor. A large roomy basement and individual heating plants were installed in each house.

Besides providing fine housing, at a critical time, the project embodied these three outstanding features:

1. Building at rock bottom prices, well planned homes, on ample lots in an attractive neighborhood.
2. To provide for uninterrupted tenure of the home without fear of mortgage foreclosure. In case of death or total disability of the head of the family, the mortgage was instantly cancelled and the home became debt free to the bereaved family.
3. To allow the possibility of removing to other localities without a considerable loss of investment. In case one's work took him to another city permanently, the property could be sold to the corporation at the original price, less depreciation.

At the outset, finances embarrassed the project. No money was available, in contrast to the millions the federal government is ready to release today. The Garden Homes Co., was capitalized at $500,000, with $250,000 in common, and $250,000 in preferred stock. Ten percent was required of the tenants to gain possession of their homes. The City
and County of Milwaukee each contributed $50,000 in taking up preferred shares in 1920 and again in 1922. $77,300 was taken by private citizens and another amount raised by the Chamber of Commerce. The sale of lots reserved for the business district provided a handsome profit, when these had to be sold due to further financial embarrassment, and this somewhat curtailed the garden nature of the project with respect to its business district on the west end or boundary. But in 1925, the company was able to abandon its charter, with each person purchasing his own home, and all investors, including the municipal and county governments, were paid back with interest.

The Approximate Cost of each house and lot was $4800.00, with 25 years to pay at $43.50 to $49.00 a month. Street, sewer and water cost $354.24 per lot.

Looking across the park, double-type houses can be seen.
The planners, after 20 years can still be proud of their project. Depreciation is still negligible, and no finer guarantee of a continued well-kept neighborhood can be found elsewhere. Parks, playgrounds, and schools are now maintained by the city to which Garden Homes was annexed, giving the best of advantages to the children.

Street Scene, showing simple variety in architecture of homes.
In a book entitled "The Kohler Strike", the following is taken from Chapter II—The Development of Kohler Village.

A truly garden city, facing opposite a large well-kept single industrial plant, this town shows what can be accomplished by central planning and control.

"Walter J. Kohler, Sr., has been identified with the Kohler Company since 1890 (it was founded by his father in Sheboygan in 1873). The Kohler Company started out with manufacturing plow shares, bathtubs, and other plumbing fixtures. At present it makes plumbing fixtures, electric light and heating plants, pottery ware, and bathtubs. The factory buildings were originally located in Sheboygan. In 1898, Mr. Kohler bought up some land and started what is now known as the Kohler Village, located four miles southwest of Sheboygan, Wis. At that time Mr. Kohler told W. C. Weeks, his architect, that he had a dream of some day building a model city.

"Several buildings were erected and part of the production was moved out to the new location in 1899. The old plant in Sheboygan was sold; in February 1901 the new plant was partly destroyed by a fire. It was rebuilt after that and since then has grown to its present size, about three city blocks long, and two deep. Gradually some nondescript buildings grew up; and since Mr. Kohler had seen a number of industrial towns in the country, most of them very sad-looking affairs, he discussed laying out a planned village with his architect. In 1912, he visited Europe with
his architect and studied various garden cities, because at that time Europe was far in advance in outstanding examples of good housing. Upon Kohler's return, the company engaged town planners, landscape men, architects, engineers, and with some people of the community proceeded with the building of the city.

"One unit of the Kohler organization is known as the Kohler Improvement Company, which builds homes and owns the land. According to Mr. Kohler, its charter provides for no profits and it has lost considerable money. It sells homes at cost and operated the farm land which it bought in advance to protect the community.

"The Kohler Building & Loan Association, another unit, taking the name of the village, is organized under the laws of the State of Wisconsin, has a charter, is subject to the banking laws of Wisconsin, and has periodic examinations. The Kohler Company, to quote Mr. Kohler, has no official connections with the Kohler Bldg., & Loan Ass'n, except that it has at times loaned it money. The ownership includes hundreds of people, not only of the village of Kohler, but in the city of Sheboygan and in the county. It has two kinds of stock, the paid-up, which pays five per cent interest and the participating stock for those who buy homes. Those who have 5% interest-bearing stock have been fortunate because of the ability of the company to make its payment. Many outsiders have bought stocks, have made their monthly payments, and have used it as a medium of investment.

"During the World War, the Kohler plant made munitions for the government: three-inch projectiles, hand grenades, and smaller quantities of other munitions. Additional buildings were put up and the company experienced an era of expansion. The American Club, a large residential type of structure, was built to accommodate the single men working in the plant; it has a beautiful large dormitory, a dining hall, and recreational facilities for the men. During the middle twenties, the plant hired close to 4,000 men.

"The village has itself grown until its present population is about 1800. Most of the construction of homes occurred between 1922 and 1928. Kohler is a beautiful city, well-planned, and based upon a definite set of patterns to which houses, garages, and shrubbery conform. The lawns are well kept, the trees are uniformly trimmed, and beautiful flowers help to color the boulevards and bridle-paths. In
recent years, should any house need external decoration, and its owner find it impossible to carry through the improvement, the company supplied the paint. This was true, however, only if he conformed to the color scheme and design specified by the company. There are approximately 450 houses, most of them brick, placed equidistant on the winding streets. More than 90% of the inhabitants of these beautiful homes work in the Kohler factory; of this number more than half are superintendents, office workers or high officials. This leaves perhaps 200 homes for the rank and file workers, indicating that in normal times, less than 10% of these workers occupy "model" homes.

"Two blocks of business buildings artistically planned and arranged, front on a wide street opposite the factory itself. An interurban line connects Kohler with Sheboygan and Plymouth, a city 20 miles to the West, and gives the factory railroad facilities, for freight shipments. Again, let it be repeated, the village, except the back of the factory which faces open country, is flawless. (24)

Almost identical in scheme to Kohler, Wis., but without the factory which is so necessary for men to earn a livelihood, is Greendale, Wis. Conceived in distant Washington, D. C., and erected about 8½ miles southwest from downtown Milwaukee, is a model village of 572 houses spread out over what was once farm land. This project is one of three,—Greenbelt, Maryland, and Greenhills, Ohio being the other.

(24) Uphoff: The Kohler Strike. Chapter II.
two—planned by Rexford Tugwell of the Resettlement Administration, now the Farm Security Administration. Its basic idea is that of a planned small town, built with large protecting farm areas around it, yet within ten to thirty minutes by fast transportation to distant towns and factory jobs. It is a suburban community with houses on spacious lots and short "blind" streets, with but one artery running through it. Everything is owned by the Federal Government, and will be supervised by a cooperative corporation. The Village itself will be incorporated under the state laws, though all the residents are renters.

Like the layout of the village itself, the construction of the individual homes is itself unique. There are no basements, nor consequent expense of excavations, nor space for accumulations of refuse and costly do-dads. Each unit is individually heated, and garages are for 90% of the houses. Rentals range from $19 to $36 a month. The average is $38.75 which includes electricity for cooking and refrigeration, and garage.

A total of 3400 acres were purchased for Greendale. 750 dwelling units were planned, but the number reduced to 572. These cost a total of $9,375,000, though $1,350,000 is claimed to be due to the inefficiency of relief labor. The net investment is at least $7,000,000, averaging over $10,000 for each house. Annual gross income is figured to amount to 4½% on the investment, and will take care of amortization, and give the government a return of $25,000 annually. But as the
Milwaukee Journal points out in an Editorial:

"How in the name of common sense can there be any amortization when it takes the collections of 200 years to meet merely the cost of the houses themselves? If the ordinary property owners must figure 10 to 12% a year in rent if he is to pay taxes, repairs, carrying charges, and depreciation and have a bit left for himself, how can even the power of government bridge the gap between 4½% to 12% without subsidy? Greendale is a business failure." (25)

But the Federal Government defends "subsidy", and claims it is necessary for persons of sub-normal income. Yet, to secure admission to Greendale or other government housing projects, minimum incomes of $1,000 a year is necessary, and families up to $2,200 a year can secure admission. Is it fair that people of such means should be given ultra-modern housing while the other 99½% of the population look on at what these enjoy at their expense?

Greendale, however, is a success as a demonstration project in construction and a model for villages of tomorrow compared with those which grew haphazardly. But it remains for some other economic plan to make such projects workable.

by themselves, notwithstanding the fact that the idea of satellite towns originated in the 19th Century in England with the Towns of Welwyn and Letchworth, planned by Ebenezer Howard in 1898, who pictured a union of country and city with no waste.

Parklawn, a project constructed by the Housing Division, P. W. A., one of 51 national projects, but among the largest, is truly urban in aspect and radically different than Greendale or any other concept of housing. Disregarding the checker-board system of city blocks, it takes in an area of four city blocks square, 16 square blocks altogether, as an entire unit, with streets running along its edges, and none transversing it. Housing is by means of two-story oblong houses, eight to twelve living units per building, and arranged around a central court containing a little lawn space, garages, and small playgrounds. There are many clusters of these buildings with a heating plant, recreational meeting hall, pool, picnic and larger playgrounds arranged in the center of the project. Two open-air parking lots are in the background as well as a large baseball diamond, and tennis courts—all the facilities residents could wish.

Parklawn is more than low-cost housing; it is low cost living. In building, economies have been effected by "cutting useless corners." Extensive wiring is saved by pull-chain fixtures. A buzzer above the front door eliminates extensive doorbell installation. Lack of basements and dining rooms, placing of laundry tubs in a small utility room directly
behind the kitchen sink, kitchen cupboards, simplified plumbing and central heating, electric cooking and refrigeration—all eliminate cost. The small storage and accumulation spaces for each family makes economical living possible with room only for necessary furniture, not for articles extravagantly bought. All dwellings have been carefully planned so that each room has outside exposure and a pleasant view, and the interiors designed to promote maximum housekeeping efficiency with a minimum of labor.

Buildings occupy only 20% of the land. There are 406 dwelling units and 112 apartments, with 83 garages. Parklawn occupies 42 acres for which the federal government paid $89,400, or about 5 cents per square foot. Construction cost $2,238,500, which contracted was awarded the Geo. A. Fuller Co., of Chicago. Of this total cost of $2,800,000, allocated by the President, 45% of the total capital cost was given as an outright grant or subsidy by the Federal Government, and the remaining 55% is to be charged with interest and amortized over 60 years. Cost of its 2018 rooms averaged $1143 per room, or $1138 per room, including the cost of the land, landscaping, electric stove and refrigerator installed in each apartment, and community buildings. Parklawn pays no city taxes, yet sends its children outside to city schools, which account for 37% of municipal taxes. Rentals range from $21.75 to $37.50 per month from a 3 room apartment to a 5 room group house, with heat, hot and cold water, light, cooking fuel and refrigeration included.
Parklawn is again a "subsidy" project, over 45% of the total cost, given outright to 517 families with good incomes and "selected" by the Parklawn management from other landlords throughout the city. It is to be a slum clearance project, but was finally located on new land at the edge of the city limits. Originally a site from N. 6th to 8th Street, Reservoir to North Avenues was chosen, but with the high cost of land, condemnation proceedings and court litigation with heirs, lien holders, mortgagees and owners of the hundreds of parcels of land, the idea was abandoned when the federal government threatened to withdraw its allotment. So it is neither "slum" clearance in construction nor tenants selected. It is again only a social and architectural demonstration project.

About the only excuse given for "middle-class" housing projects is that the poorer classes have inherited the better housing of those who have moved into Federal Projects. 51 FWA projects have provided less than 25,000 dwelling units, while Brookings Institute stated that by 1941, the shortage will be 4,500,000 dwelling units, and Leon Gurda, Building Inspector of Milwaukee, shows in statistics that the Relation of Dwelling Units constructed to Marriages is 47% from 1910 to 1919, 70% from 1920 to 1929, 59½% from 1910 to 1929 on an average, and only 16¾% from 1930 to September, 1937. Large government projects, like Parklawn, then, with a 45% subsidy, are only dots here and there on the housing map, and no cure-all for an entire city fearing "blight."
Milwaukee's largest **private** housing project, 52 units, is known as the Story Hill Apartments, and is a significance how private enterprise can solve the housing problem. The buildings are similar to Parklawn row houses, except that a radical departure from conventional design was effected in having long second-floor porches extend, with front entrances going directly into the kitchens which face the street. The living rooms overlook the court and broad valley in the back. **Rental**, with taxation, average $11 per room, exclusive of heat. Furnaces are individually gas-
fired, and garages built under the units themselves use otherwise useless space. Concrete foundations, fireproof walls, and wood siding give the houses a modern effect, and the land on a high bluff overlooking a smoky valley was wisely utilized and make these modern apartments visible for miles around, a monument to private enterprise.

Foreign progress cannot be overlooked, especially in European countries. Outside of England, where Garden Cities originated, and London where slums were remodeled and "worked over", rehousing has been on the scale of large continuous apartments with beautified spacious grounds. Germany has provided homes for two-and-half million low-income families
in large modernistic public housing developments. Garden apartments in Great Britain has cost the government 3 billion dollars. The public housing program there has been accompanied by the greatest private building boom that England has known. Belgium, has by means of public subsidies and loans, built 250,000 low-rental homes. Sweden has built healthful modern homes for 57,000 of her poorer families.

In Vienna, the Karl Marx Apartments, constructed after the war, ranges 2½ blocks in length. Three stories high, it provides the lowest cost rent. However, bathrooms are eliminated; a separate "Baths" is maintained in the basement where a renter can go with his entire family and at a fixed fee use a bathroom weekly. Laundries are also centrally located in the basement where housewives have the benefit of high-powered machinery which can turn out and dry their wash in a fraction of the required time. A large inner court, a block square, contains all recreational facilities and is in back of the flat fronts of apartments and porches lining Austria's streets.

"But," according to the author, "the entire social life is altered. Home is just a stopping place, and the Austrian's time is very well divided between his work, marching club, military drills, night cabarets, shows, and political meetings, while Sundays he escapes on journeys to the country." (26)

In foreign housing, the Plan of the City of Stockholm, Sweden, for small-housing cannot be overlooked. So far 50,000 units have been built up according to five different

(26) Charles O. Hardy: The Housing Program of the City of Vienna.
(27) K. H. Oxlund: The Small Housing Scheme of Stockholm.
intelligent patterns. Somewhat pre-fabricated, and with extensive use of tile, beautiful, simple, practical homes have been set up costing from $2,000 to $3,000, plus land. Prices range:

<table>
<thead>
<tr>
<th>Description</th>
<th>Cost 1</th>
<th>Cost 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>Building Materials and Supplies</td>
<td>$1200.00</td>
<td>$1475.00</td>
</tr>
<tr>
<td>Contract labor charges</td>
<td>492.50</td>
<td>485.00</td>
</tr>
<tr>
<td>Other labor charges</td>
<td>476.25</td>
<td>627.50</td>
</tr>
<tr>
<td>Overhead charges</td>
<td>131.25</td>
<td>137.50</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>$2300.00</td>
<td>$2725.00</td>
</tr>
<tr>
<td>Cost of finishing attic</td>
<td></td>
<td>300.00</td>
</tr>
<tr>
<td><strong>Maximum loan granted</strong></td>
<td>2070.00</td>
<td>2570.00</td>
</tr>
<tr>
<td>Miscellaneous annual charges:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Annual installment on loan</td>
<td>134.75</td>
<td>167.25</td>
</tr>
<tr>
<td>Ground Rent</td>
<td>37.50</td>
<td>50.00</td>
</tr>
<tr>
<td>Taxes</td>
<td>7.50</td>
<td>10.75</td>
</tr>
<tr>
<td>Water, street cleaning, Ins. etc.</td>
<td>20.75</td>
<td>23.25</td>
</tr>
<tr>
<td><strong>Total annual charges</strong></td>
<td>$200.50</td>
<td>$251.25</td>
</tr>
</tbody>
</table>

"The home owner can contribute up to 50% of his own labor in his house. The loan is payable over 30 years. All material and lumber items come to the job packaged, cut, and numbered to exact size. Cabinets, and other economies are effected, and the bathtub, for instance, is in the laundry to combine an important economy. Sweden here has developed the best housing program yet to be discovered, and whole neighborhoods have been planned with these houses into garden and flower cities." (27)

What has been done, through legislation, to insure a permanent housing program in this country? The first, is limited dividend housing corporations. Regarding them, former Governor Alfred Smith of New York has this to say, already in 1928:

"Delay and inaction have less excuse now than ever before. A method has been devised for dealing with

this basic and all-important problem which is rational, economically sound and thoroughly American. Many European governments confronted by similarly grave situations have resorted to outright gifts, loans or subsidies in various forms to provide better housing for their people. These methods are alien to our practice. The plan which has been inaugurated here and which already has proved eminently successful does not invoke these aids. It does not put government into the real estate business or any other business. It is based entirely on the principle that the building of homes for families of low income is so completely bound up with the public interest and welfare that it cannot be left solely to the hazards or vagaries of purely speculative effort. It has been described as private business with a public purpose. 

"I speak of the limited dividend housing company. This is a form of enterprise in which the stockholders, those who out of their own pockets supply the capital required for conducting the business, voluntarily limit the profit which they will take out of its operations. Such a form of organization differs from the ordinary speculative building enterprise in two all-important and fundamental particulars. The first is evident in the name itself which means simply that profits instead of being all the traffic will bear are limited by the company's charter to a moderate figure—usually six per cent. The second difference, with profit-making no longer the sole purpose, is the inclination on the part of such companies to improve the quality of the product. Homes made under this plan have been happier, healthier living for hundreds of moderate income families. . . . The State of New York has faced the problem squarely in the enactment of the State Housing Law in 1926." (28)

Wisconsin has a similar law, passed after the formation of Garden Homes Co., in Sec. 180.04, but no further companies have taken advantage of this legislation. The New York Jewish Needleworkers and other Trade Unions have similarly built apartments of which the Bayonne, N. J., Housing corporation was also patterned, which erected model industrial housing. (29)

(29) Thomas: Industrial Housing, Bayonne, N. J.
But limited dividend corporations can no longer compete with subsidized federal projects, nor is there any initiative to take over and rebuild high-price real estate. The only field left is that of the nature of Garden Homes, but again, a prohibitive amount of capital is required.

The latest in legislation for low-cost housing, and a final desperate effort of the Federal Government to grasp with the problem, is the Wagner Housing Act which became law in 1937.

"This Act creates the United State Housing Authority in the Department of the Interior as a permanent agency under the general supervision of the Secretary of the Interior. To initiate a nation-wide program of low-rent housing and slum clearance, the sum of $500,000,000 is to be made available through the issuance by the Authority of federally-guaranteed bonds. Of this amount, $100,000,000 may be made available prior to June 30, 1938, an additional $200,000,000 may be made available prior to June 30, 1939, and the remaining $200,000,000 by June 30, 1940. The proceeds of these bonds may be used only for the purpose of making loans to qualified public agencies. No aid under the Act may be given to individuals or private corporations. Loans to local public bodies are to bear interest at about 3%. Maturity will be determined by the useful life of the project, with a maximum of 60 years." (30)

In brief, the Act provides:

"SETS UP A PERMANENT U. S. HOUSING AUTHORITY empowered to make loans and grants to local Housing Authorities for the construction of low-rent projects.

"AUTHORIZES FEDERAL FUNDS FOR THREE YEARS: $500,000,000 in housing bond issues; and $26,000,000 to cover cost of subsidies for three years. These "subsidies" will be for the difference in monthly rentals that people housed in housing projects are able to pay, and the higher amount they really ought to pay to make the project financially sound. The

(30) E. H. Foley's Address, Milwaukee Public Housing Conference, October 16, 1937."
government now contributes to the monthly rent of those housed, rather than contributing up to 45% of the gross cost of the project itself.

"PLACES ALL RESPONSIBILITY for initiation, design, construction, ownership and operation of housing projects in the hands of local Housing Authorities. They will also assume management of existing federal PWA housing projects.

"REQUIRES LOCAL FINANCIAL PARTICIPATION to the extent of at least 10 per cent of the capital financing, and at least one fifth of the annual contributions (the latter may be in the form of tax exemptions).

"RESTRICTS COST: Average construction cost per room is limited to $1250 in towns with population over 500,000, and to $1000 elsewhere; average dwelling unit cost is limited to $5,000 and $4,000 respectively (excluding cost of land).

"PROVIDES FOR ELIMINATION OF SLUM DWELLINGS equal in number to new dwellings constructed. This may be deferred in case of a "dangerous housing shortage."

"GUARANTEES FAIR LABOR STANDARDS and payment of prevailing wage rates on all construction assisted by this Act.

"MAKES LOW RENTS POSSIBLE: On projects built under the terms of the Act rents of $3 to $6 per room per month are possible if the maximum annual subsidy is utilized.

"CONTEMPLATES CONSTRUCTION OF ABOUT 140,000 DWELLING UNITS in the first three years; more if Congress provides additional funds." (31)

State laws were necessary to make towns become eligible for the benefits of this new Act, and make possible the creation of a local Housing Authority. 31 States have already complied. In Wisconsin, councils of towns may adopt a resolution creating a Housing Authority of five Commissioners appointed by the Mayor. They shall have power to buy, or

(31) Bulletin by the Housing Committee, American Federation of Labor, Labor Housing Conference, Washington, D. C.
obtain land with all fixtures thereto, enter into contracts for the building, remodeling, renting, and bonding of such units, and shall even have the right of "eminent domain" to carry out its projects. Said body "shall have an area of operation in the city for which it is created and the area within five miles of the territorial boundaries thereof, but not beyond the county limits or boundaries of another city for which a housing authority has been created." (32)

The Wagner and U. S. Housing Authority Act again aids only in bringing about housing reform in "spots", and solves nothing between such "spots." It is extremely limited, compared to the extent and real need itself. Furthermore, it gives luxury quarters to the poorest of the population, actually half-supporting them, giving them no incentive to better their social position, and cease becoming an expense to the government. At the same time, it is an injustice to the striving middle class who must pay at their own expense for housing of a lower standard.

A Wagner Housing Project would work like the following table:

<table>
<thead>
<tr>
<th>Description</th>
<th>Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>Capital cost of project assumed to be</td>
<td>$1,250,000</td>
</tr>
<tr>
<td>Loan of 90% from U. S. Housing Authority</td>
<td>1,125,000</td>
</tr>
<tr>
<td>Local contribution toward construction cost, equal to 10% of project cost</td>
<td>$125,000</td>
</tr>
<tr>
<td>Economic rent: Annual charges for interest and amortization</td>
<td>$45,000</td>
</tr>
<tr>
<td>Annual cost of maintenance and operation (excluding taxes)</td>
<td>$40,000</td>
</tr>
<tr>
<td>Total annual economic rental</td>
<td>$85,000</td>
</tr>
</tbody>
</table>

Total annual economic rental - - - - - - - - - - $85,000

Rental which Slum Dwellers Can Afford: At $4.00 per room, with 1,000 rooms, total annual rental - - - - - - - - - - - - - - - - - - - - - 48,000

Remainder to be made up by Subsidy 37,000

Minimum local contribution is one-fifth of annual Federal contribution - - - - - - - - - - - - - - - - - - - - - - 7,500

But actual local contribution is tax-exemption, which would be more than sufficient to meet minimum requirement of 20% local contribution.

Federal Annual Contribution would be - - - - 37,000 which is less than 3% of the project cost.

Above project would take care of about 250 families, and rental of approximately $16 per unit (Federal Gov't adds another $12 monthly out of its funds) does not include utilities, heat or light.

The Federal Government in elaborate tables, defends its "subsidy" idea of housing by showing the difference in taxation residents of such a project would pay, if taxed, compared to the taxes on their cheap former slum living quarters. Again, the rate of fire protection is almost nil, health and police services a minimum, and centralized ash and garbage collections hardly any cost. Schools are the only remaining expense.

Of all the different housing plans, problems, legislation, and different demonstration projects, there still remains some feasible plan to be formulated whereby sanely and steadfastly, better living can be given to the 75% of our population and not a lucky few who are the 2% to 5% benefitted. Our tenements and slums are still with us. Blight neighborhoods continue to progress to a worse stage.
Haphazard housing continues. Dilapidation, remodeling of larger units into several smaller ones, continued building of frame buildings and shacks at the fringe of cities and long country roads leading thereto, is unchecked. Only in wealthy neighborhoods, or yet untouched newer areas of modest homes, can be found gems of planning, outside of group projects as Kohler, Garden Homes, or the newer Parklawn and Greendale, planned over a wide area.

The Author's Plan

The author proposes a plan that is extremely simple, yet still unthought of by our politicians. It is nothing more than applying the same principles to housing that the Social Security Act provides for the worker—extracting small annual contributions and setting these up in individual accounts "earmarked" for that person or property which in time and with the aid of compounded interest grow into sizable amounts which will provide for future rebuilding, row after row, block after block.

If we are to rehouse America, we must depend on such projects as Parklawn and Greendale, where the government has poured in millions, and assumed complete direction of the enterprise. But these projects to be feasible must, like Garden Homes too, be built upon cheap land, and such land is found only at the outskirts of our cities, or distant farm fields.

A slum clearance project can be accomplished only when the city steps in by condemning houses in a slum district,
forcing their owners to tear them down, or by purchasing such buildings, land, and all, as it does when erecting new civic buildings or improvements, exercising the right of eminent domain. But when the city acquires private property, it finds the procedure costly. Fictitious values must be paid for land, assumed to be worth many hundreds of dollars per foot on account of its proximity to the downtown area. Courts, too, in figuring the value of buildings, will consider replacement and original construction costs, for which the city must pay, just to tear down.

Condemnation of unsafe dwellings has been carried quite extensively in Milwaukee under the direction of the city Building Inspector, and from 1928 through 1935, 2,220 housing units were razed. The result is that today we have intermittent parking stations between older buildings. This same procedure was carried out in New York City, in 1895, but the courts soon ruled that "buildings, even if uninhabitable, might nevertheless be used for some other purpose."

So to eradicate slums, cities must pay dearly, and the cost and taxation will fall back on the other real estate holders. In addition, the city will become the largest dealer in real estate, and renting, if it replaces condemned structures with new housing, in competition with its own taxpayers. Nevertheless, let the city proceed to assess a "slum clearance" tax at its cost of from $10 to $20 per
thousand of assessed valuation, or 1 to 2% on the total value of all parcels of real estate in crowded blight, residential, and light business districts. But, these taxes, shall not represent another assessment that property owners never see again. On the contrary, the tax shall represent the 2½% that the property owner himself deducts in filing his income tax return as general "depreciation or obsolescence", which the city shall gather and set up in an individual account to the credit of that particular parcel of real estate, to be repaid at some future time for new building, with compounded interest. The tax will be for "slum clearance", but the faith of the city will guarantee repayments to the individual property owner when his own place shall grow old and need replacement.

To give some idea of the power of compounded interest, 3% will double itself in 23 years, 100 days. 1½% will double itself in 46 years. But since most real estate consists of 1/3 the value of the land and 2/3 represents the value of improvements, a 1% general tax will be the equivalent of a 1½% tax on improvements alone. A 2% tax will represent a 3% general tax on improvements alone which depreciate and in time need replacement. Land does not. The writer suggests a 1% general "Slum" tax for the first five years, raised to a 2% general tax, or instead, a fixed tax of $75 on each house and lot, to insure in the course of time a "grant" of $5,000 by the city for new housing.
These assessments need not, nor must not be held for 23 to 46 years before being released, with the resultant rebuilding of cities overnight or all in one year. While they draw interest of 3% upwards on city bonds, or delinquent tax certificates, this fund shall be expended in advance either by loans, setting of negative credits in the individual tax accounts, or mortgages, at interest, to housing projects started in advance. In fact, the program should be carried out at once, beginning with one ward every year, starting at the oldest. There are some 30 wards in Milwaukee alone.

Imagine the owners in a hundred square blocks, 50 to each block, each receiving $5,000 from the city government for new rebuilding, tearing down their antiquated housing. The result will be either new houses on the pattern of Garden Homes. Or the entire group can get together and form a corporation to build and operate a project like Parklawn, Story Apartments, or Greendale, relocating streets and lot lines. Imagine a once prosperous, decaying old town or village, maturing on the same plan, relocating on entire new grounds, around some new industry, with new homes and laid-out parkway streets, only to plow under the old obsolete village, it has left.

This program is flexible. In old neighborhoods, where new construction has already taken place, rehousing can be made to fit into these. Where adjacent owners are bought out, to furnish more space around apartments, or crowded buildings, such buildings can be assessed for the resultant
benefits as the "Kline Law" provides in Milwaukee. Or in cases, within ten years, half grants can be made by municipalities for the modernization of entire blocks of existing dwellings. Or districts near unpleasant factories need not be rebuilt, but the sites cleared for industrial use, and the landowners shifted to some new subdivision outside of the city over which the municipality has control.

Further results of this plan are:

1. Depressions and booms in the building industry would be eliminated, assuring continued normal times and steady prices. Such constant rebuilding would be a "stabilizing force in our economic system."

2. Different building trades would be sharply separated, and steady jobs would be provided for trade school graduates.

3. Jobs would be provided for a force of maintenance men for such projects as Parklawn, Garden Homes, Kohler, etc., as created. Residents also would be trouble free.

4. Reduced municipal cost and taxation would result by savings effected for fire, police, and health protection when safer more modern quarters replace slums.

5. The future of housing and neighborhoods is insured against "blight" and greater confidence in building would result.

6. People's initial investment in real estate would always be liquid and par, as their "credit" would offset depreciation.

7. New outlying subdivisions could be either opened, planned, or approved by cities, and even prices regulated for new lots.

8. Mistakes in a neighborhood by houses not in agreement with the others in location, appearance or architecture, could be rectified by a release of necessary funds from the Housing Planning Commissions or authorities.

Neighborhood associations to secure uniform design in new building, and protection of property have long been recognized and encouraged by Missouri State Law; but not every adjacent landowner has sufficient funds to provide for what-
ever the group agrees on, and if he drops out, he lets his property shift for itself, and discourages his neighbors.

Let new modern construction, instead of being subsidized, be for those able to pay, going to the highest renter. Many people of means expressed disappointment at not being able to live in Parklawn because they earn too much. Slum dwellers do well if they inherit the housing of the middle class, and in turn are encouraged to secure a better income, instead of becoming a government beneficiary. Let private earning substitute government spending and taxation. Let private spending substitute government borrowing to spend.

Every growing man and woman has the right to health and education. That secured, they have the right to a livelihood, to a family, and the things necessary for a home life on the highest standard possible. It is not the duty of government to provide a fine home. It is the duty of government to enable people to earn and secure that home by their own hands and work. And new housing must be in reverse—from the outskirts of our cities toward the downtown area, to take the place of buildings in "blight" areas, old, but handiest to businesses, and places of employment in downtown offices, stores, and factories.

Housing and prosperity are co-related and much dependent upon each other. Why the American people cannot live in better homes and on a higher standard of living is no longer unexplained. Economic life is but the exchanging of our
services, but with money as the medium of exchange. No
dollar is ever spent but that it is split up and divided
so as to compose a part of hundreds of salaries and pay
checks. Why cannot slum dwellers through higher wages or
new and better jobs, find some way of giving the home builder,
or the farmer who figures in a three-cornered trade, luxuries
in exchange for better housing. People must be furnished the
means toward better housing.

Housing must be guarded from the results of "higgledy-
piggledy" building of unrelated individual owners. A tax
by which the city saves for the owner, the depreciation
amounts on his buildings, and releases these accounts for
an entire district at a time for new building of a unified
design and large-scale operation, is the only way of making
the city beautiful of tomorrow, opening the new era in home
construction, and in REHOUSING AMERICA ! !

Uphoff, Walter H.: The Kohler Strike, its Socio-Economic
Causes and Effects. Privately printed, 1935. Chapter
11--The Development of the Kohler Village.

Wood, Edith Elmer: Slums and Blighted Areas in the United
States. Federal Emergency Administration of Public
Works, Housing Division, Bulletin #1. Government

Oxholm, Axel H.: The Small Housing Scheme of the City of
Stockholm. U. S. Dept. of Commerce, Bureau of Foreign
and Domestic Commerce. United States Gov't Printing
Office, Washington, 1935. 52

A Housing Program for the United States: National Association
of Housing Officials, Chicago, Ill., Nov. 1934.

Greenbelt Towns, resettlement Administration, Washington, D. C.
Bibliography


Hardy, Chas. O., assisted by Robert R. Kuczynski: The Housing Program of the City of Vienna. The Brookings Institute, Washington, D. C., 1934. $2.00.


Tarry, Helen: Garden Homes Housing Project--A Summary--June, 1934. Municipal Reference Library, City Hall, Milwaukee, Wis. 331.833 M64ga.

Thomas, Andrew J.: Industrial Housing. The Bayonne Housing Corporation, Bayonne, N. J., 1925.


Slum and Low-Rent Public Housing; Hearings before the Committee on Education and Labor, United States Senate, June 4-7, 1935, on Bill S 2392 (74th Congress).


Parklawn, information bulletin. (Milwaukee, Wis.) 1937.

Housing Official's Year Book, 1935. Edited by Coleman Woodbury, National Association of Housing Officials, 850 E. 58th Street, Chicago, Ill.

Catalogs:

Modern Homes--Sears Roebuck & Co., Chicago-Newark.

"Honor-Bilt" Homes, ready-cut. Spring, 1937.

Pre-Fab Homes--Harnischfeger Corporation, Houses Division, Milwaukee, Wis.


Federal Housing Administration Bulletin: "How to Own the Home You Want." "How you can Build, Buy, or Refinance Your Home." FHA Form 2065.

Proceedings of the Milwaukee Public Housing Conference, Plankinton Hotel, October 16, 1937. Published by the Milwaukee Housing Council, Mariner Tower, Milwaukee, Wis. 25c


Housing: Cooperative Housing:

Now. . How Can We Use It to Build Houses? Pamphlet, Housing Committee American Federation of Labor, 901 Massachusetts Ave., Washington, D.C.

The Milwaukee Journal:
"Turn Mansions into Tenements" March 21, 1937.
"Milwaukee's Largest Private Housing Project" (Story Hill Apts.) Dec. 6, 1936.
"Greendale is Ready" Editorial. March 14, 1938.
Approved

Robert J. Barr
Major Professor

Jul. 9. 87
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Date ____________________________