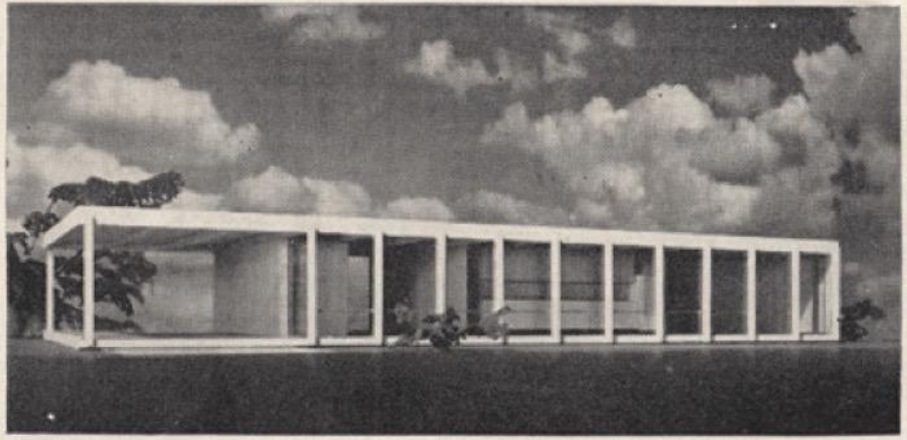
# #MuseumFromHome with the Elmhurst Art Museum


MIES, McCORMICK, & PREFAB



**MIES VAN DER ROHE** Houses of Glass and Steel designed by Mies Van Der Rohe. 7 rooms — 2 baths — carport. 4 houses to be built Northwest of Elmhurst or can be built on your own site.

**INQUIRE**

**ROBERT H. McCORMICK, JR., HA 7-0618**

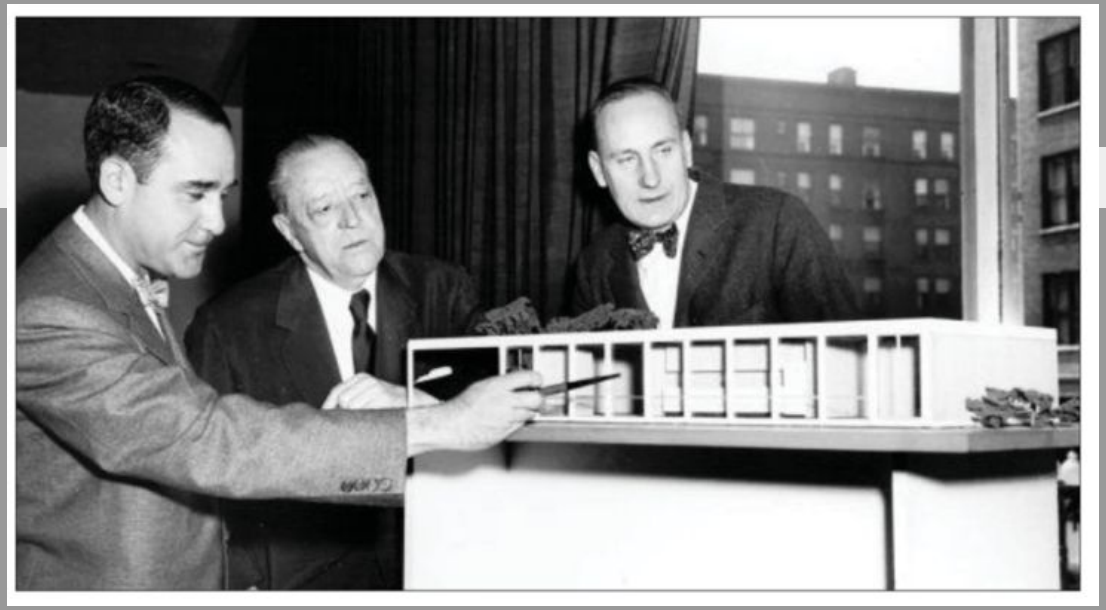
Previous image: McCormick House, photographed by Steven Koch.
Above image: Advertisement for Bensenville Houses, circa 1955

# The Idea

*"What [Mies] is designing now is what everyone either will dream of owning or will own 75 years from now."*
Chicago Daily News, May 1954

Following World War II, the United States had a housing shortage. Mies van der Rohe just finished his iconic Farnsworth House and 860-880 Lake Shore Drive in 1951, and like other architects of the time, explored plans for prefabricated housing.

Mies proposed replicable houses with repeated elements much like his famous steel and glass apartment buildings. The 1952 McCormick House was the prototype for a larger housing development for Chicago's western suburbs.



# Planning & Development

Left: Greenwald, Mies, and McCormick with model for a prototype house.

Mies worked closely with Herbert Greenwald and Robert McCormick as co-developers of the McCormick House and proposed prefab development. After finishing the successful--and still iconic--860-880 Lake Shore Drive apartments together, they hoped to continue to redefine modern architecture along with Mies. Together they wanted to see how the principles of the international style and the booming housing market of post-World War II could come together.

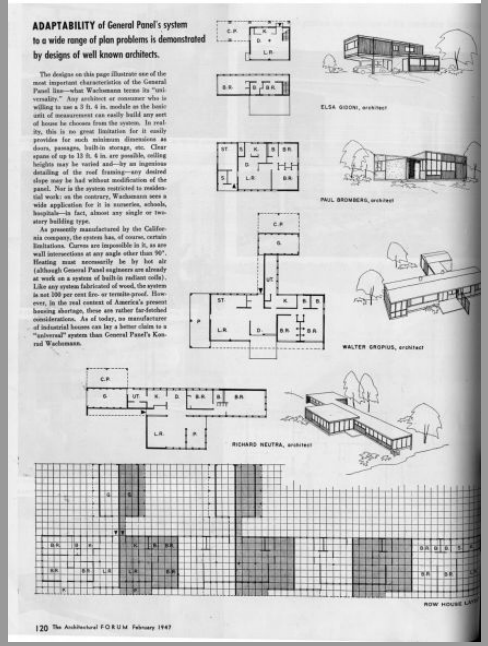
# Prefab & The Boom

Beginning in the mid-1940s through the early 1950s, almost 11 million men and women were released from the armed services. This combined with a mass movement by new families to the suburbs, led to a housing shortage in the United States. The housing and real estate business were slow to respond to this new demand.  Developers and architects of the day had to think quickly to develop cheap and easy assembled housing units to help deal with the massive influx of veterans returning to civilian life.

"Family Looking at House" by H. Armstrong Roberts shows the American dream in the 1950's


The housing crisis saw newlyweds with bawling babies often doubled up in expensive apartments, or living in temporary dwellings built by the Navy and even converted trolley cars. However, the benefits provided by the GI Bill allowed new couples and families to apply and receive home loans to purchase affordable housing. They were looking for cost-effective houses with attics, basements, and backyards for their expanding families.

General Electric advertisement depicting a US soldier and his wife dreaming of a home. Image courtesy State Museum of Pennsylvania.



**ADAPTABILITY** of General Panel's system to a wide range of plan problems is demonstrated by designs of well known architects.

The designs on this page illustrate one of the most important characteristics of the General Panel line—what Wachsmann terms its "universality." Any architect or consumer who is willing to use a 2 ft. 6 in. module as the basic unit of measurement can easily build any sort of house he chooses from the system. In reality, this is no great limitation for it easily provides for such minimum dimensions as doors, passages, built-in storage, etc. Clear spans of up to 13 ft. 6 in. are possible, ceiling heights may be varied and—by an ingenious detailing of the roof framing—any desired slope may be had without modification of the panel. Nor is the system restricted to residential work: on the contrary, Wachsmann sees a wide application for it in nurseries, schools, hospitals—in fact, almost any single or two-story building type.

As presently manufactured by the California company, the system has, of course, certain limitations. Curves are impossible in it, as are wall intersections at any angle other than 90°. Heating must necessarily be by hot air (although General Panel engineers are already at work on a system of built-in radiant coils). Like any system fabricated of wood, the system is not 100 per cent fire- or termite-proof. However, in the real context of America's present housing shortage, these are rather far-fetched considerations. As of today, no manufacturer of industrial houses can lay a better claim to a "universal" system than General Panel's Konrad Wachsmann.

ELSA GIDONI, architect

PAUL BROMBERG, architect

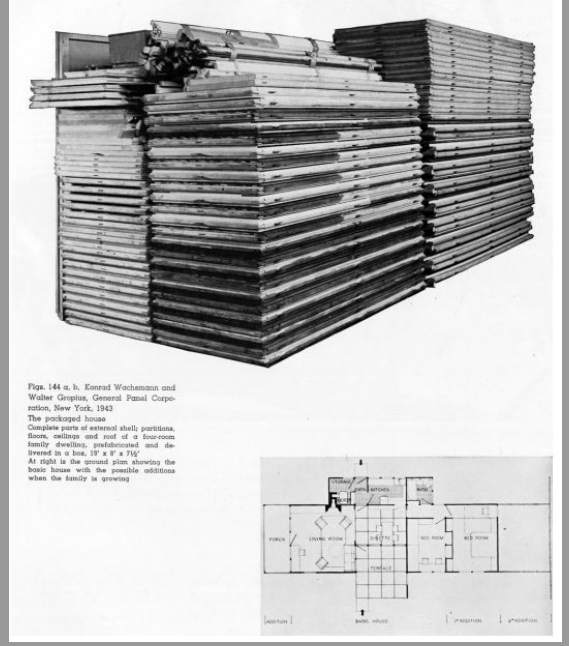
WALTER GROPIUS, architect

RICHARD NEUTRA, architect

ROW HOUSE LAY

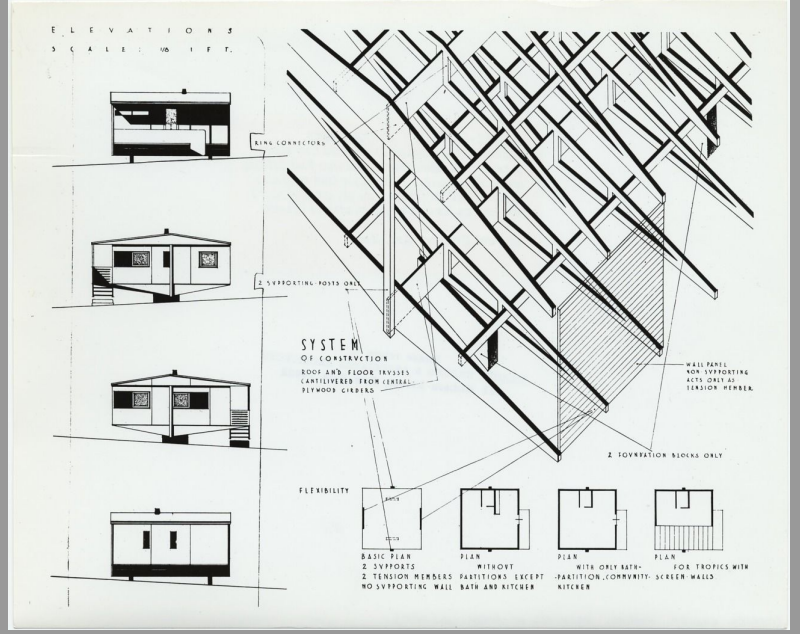
120 The Architectural FORUM February 1947

"Adaptability of General Panel's system to a wide range of plan problems is demonstrated by design of well-known architects." From (Architectural Forum, February, 1947): 120.



Figs. 144 a, b. Konrad Wachsmann and Walter Gropius, General Panel Corporation, New York, 1943
The packaged house
Complete parts of external shell; partitions, floors, ceilings and roof of a four-room family dwelling, prefabricated and delivered in a box, 19' x 8' x 7½'
At right is the ground plan showing the basic house with the possible additions when the family is growing

The Packaged House System in László Moholy-Nagy, Art and Vision, 1946.

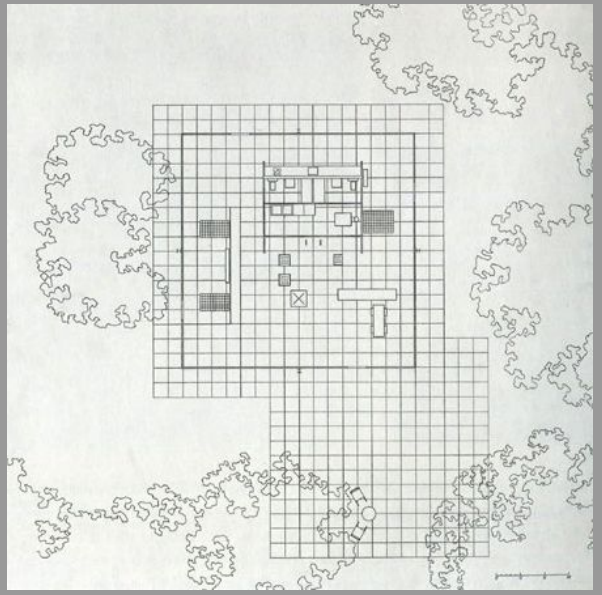



Plas-2-Point prefabricated house, elevation drawings, designed by Marcel Breuer, 1942

Other architects at the time were also trying to find an answer to the housing crisis with their own prefab houses designs: Frank Lloyd Wright (American System-Built House, 1911), Walter Gropius and Konrad Wachsmann (Packaged House), Buckminster Fuller (Wichita House, 1945), Marcel Breuer (Plas-2-Point, 1942). Some built pre-assembled models delivered to your lot, while others were quickly built on site.

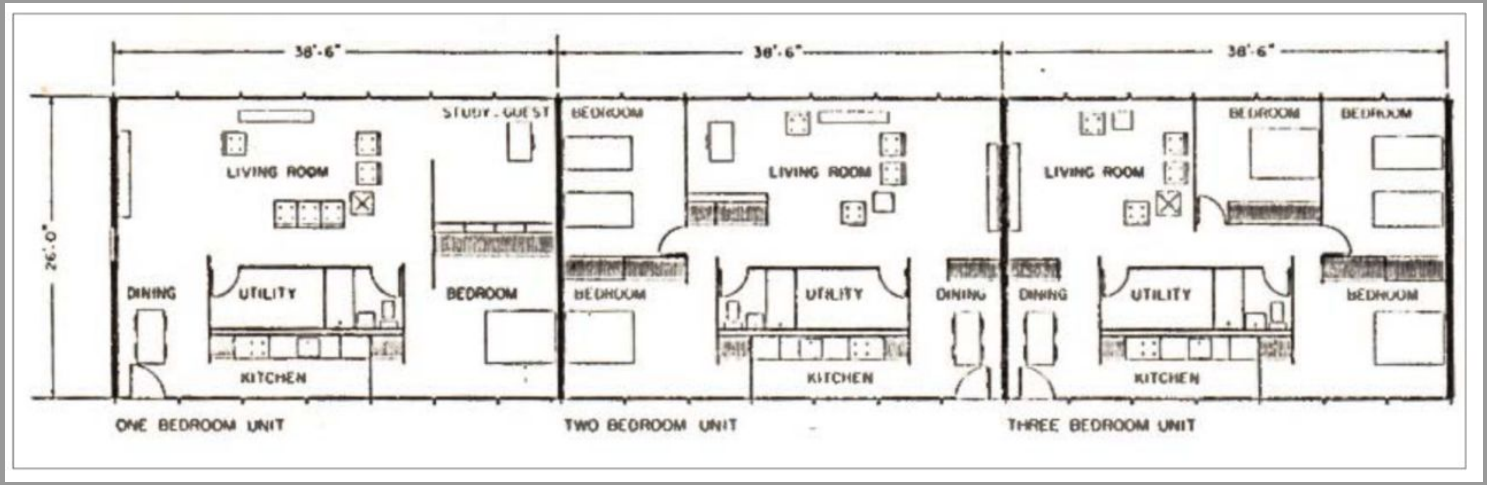
# Design: Fifty by Fifty House

Between 1946-1951, Mies was already working on a series of designs for homes during the construction of the iconic Farnsworth House. In 1950, Mies proposed the Fifty by Fifty House, also known as the Core House. It was the first of the prototype steel houses that Mies designed. He sketched variations for forty x forty foot and sixty x sixty foot variations and many options for the interior layouts. The roof and floor are supported from four steel columns placed at the center of each wall instead of at the corners. The exterior walls were to be all glass with minimal frames and the interior had a utility core and thin interior walls. The interior partitions are minimal and the plan is very open.



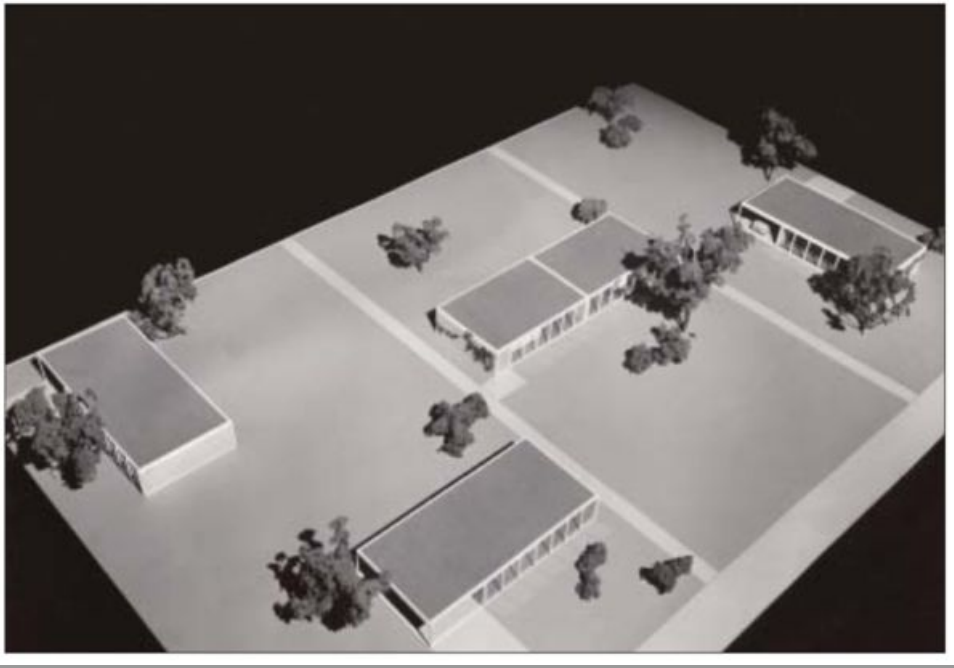
Fifty by Fifty House Plan. Source: Mies van der Rohe Archive, Museum of Modern Art, Drawing 5007.62

# Design: Row Housing

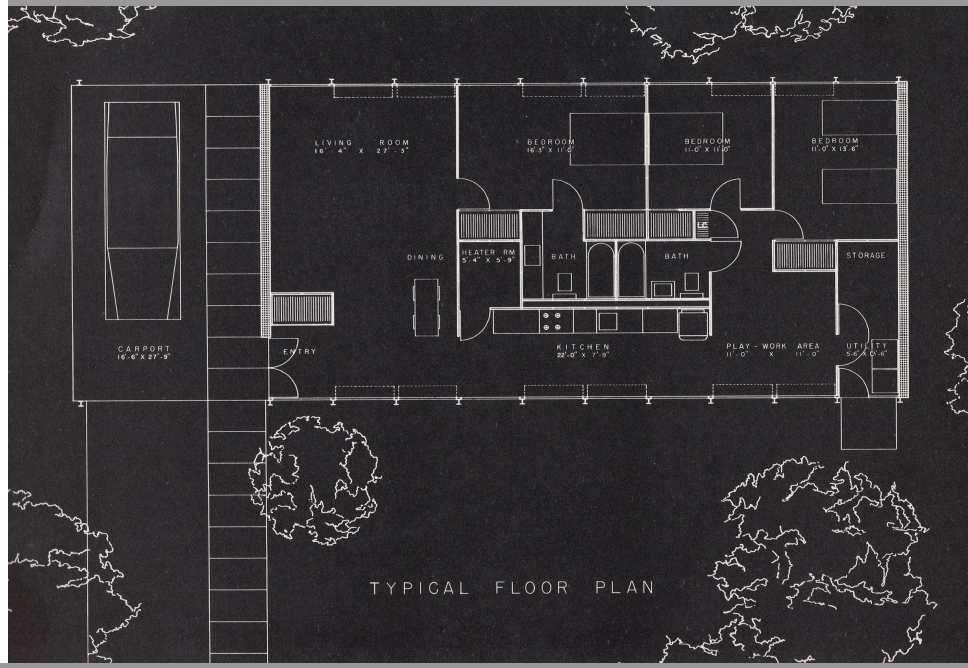



Mies van der Rohe, Proposed Row House Interiors, Architectural Forum, Nov. 1952

Then in 1951, Mies started to develop steel-frame row housing. Each row house version occupies the same amount of square feet but Mies created different interior variations: the left residence is a one bedroom version with a study, the middle plan shows two bedrooms, and the layout on the right shows three bedrooms. All of these plans include thin non-load-bearing interior partitions, the brick walls at the short sides, and steel and glass window walls on the long sides.



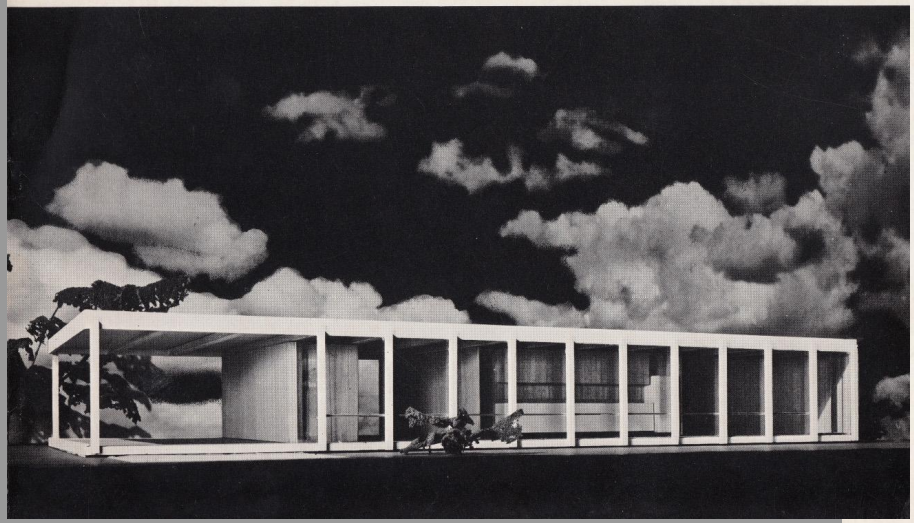
Model of Prototype Row Houses, circa 1952.(Source: Hedrich Blessing 15696C)



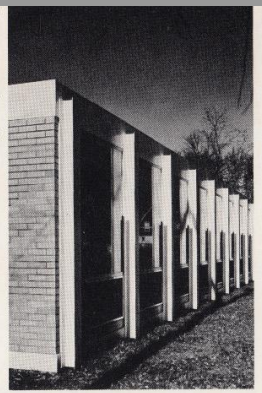

Bensenville Row House Brochure, circa 1955

Note, in the image above, how the two attached row houses in the center do not have carports, while the three detached houses at the perimeter have carports. Also note how the houses are rotated in different orientations. The houses face different directions with glass walls facing away from each other for privacy. Instead, each would look at the brick of its neighbor..

houses designed by Mies van der Rohe



photos by Hedrich Blessing



The living-dining space remains separate from all sleeping rooms except for the master bedroom, with its private bath. The play-work area, so often located in a basement, is just a step from the efficiently designed kitchen. This play-work area can effectively double as a nursery, as a teen-agers' living room, as a music or TV room or just as a second living room. The mechanical services, baths, kitchen and heater room, are concentrated back to back in a central core.

In these houses, glass walls replace mortared walls punctured by the conventional picture windows. The glass wall doesn't merely disclose a section of the outdoors, but reveals to the expansive eye and spirit a constant weather-changing spectacle from the earth up, of plant and creature. These glass walls, though once limited to use in wooded areas, are now, thanks to economical air conditioning and tinted glass, practical in every locality. Isolation is available with the drawing of a curtain. In this house, architecture and technology have combined to contribute a new dimension.

*For further information:*

**Robert H. Mc Cormick, Jr.**
**11 S. La Salle Street**
**HArrison 7-0618**

Bensenville Row House Brochure, circa 1955

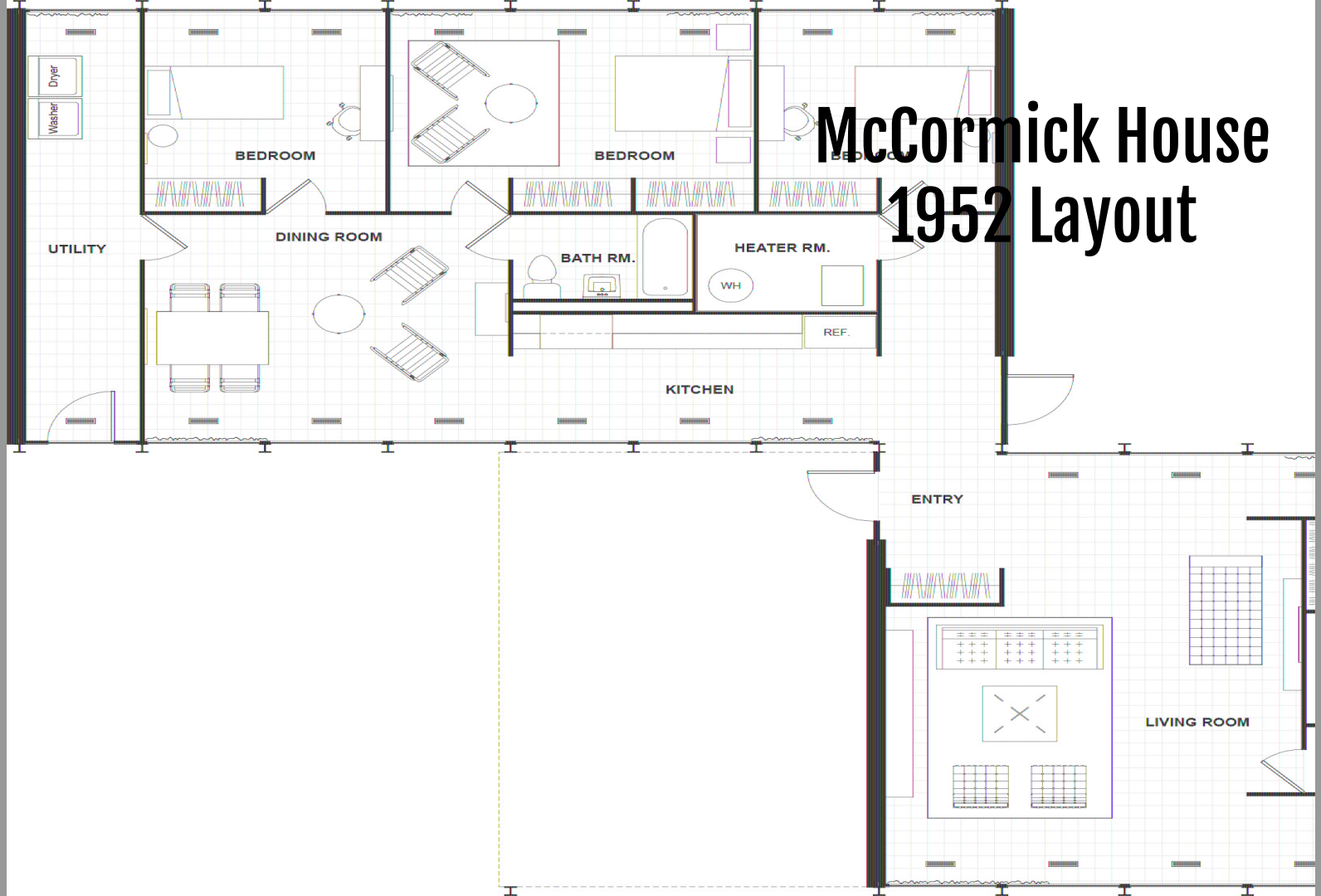
A four-page brochure was created to promote the potential prefab developments for the Bensenville Row home project, which featured images of the McCormick's home as a model--including pictures of his wife and stepson.

# Prototype: McCormick House

Ludwig Mies van der Rohe_McCormick House, view of front exterior, 1950s_Hedrich Blessing Archive, HB15690B, Chicago Historical Society

The prototype was also used as a home by Robert McCormick, Isabella Gardner, and their family. It was built at 299 S. Prospect Avenue in Elmhurst, which could be shown to others in the western suburbs for their proposed neighborhoods of multiple housing units. Mies designed the prototype with two row house units connected at a central pivot point, which created two separate wings: one for the parents and one for the children. The house was sited on a large "estate lot" 270 feet deep and 90 feet wide. The front of the house was set back 125 feet from the curb. During 1952, and even today, this house presented a different format from the standard suburban home.

# McCormick House
# 1952 Layout



Images from the Hedrich Blessing Archive, Chicago Historical Society.

Mies introduced an open plan design and a modern aesthetic to the interior. Yesterday’s formality was replaced by collaborative spaces for both entertaining and family activity. The McCormick House's living space paved the way for current trends in residential design, creating a connection to the outdoors, while making the kitchen a central point and the heart of the home.

# Greenwald House

The only other house built by with the row house designs is the Morris Greenwald House. This privately owned home is the third and last house built by Mies in the United States in 1955. It was constructed for Herbert Greenwald's brother, Morris, and his wife Rose. It is situated on a large lot in Weston, Connecticut.

Basic details of the house are the same as the McCormick House including structural bay spacing of windows, steel frame details, and its proportions in all directions. A dark reddish brown brick is used instead of the buff colored brick used at the McCormick House. The house is entered through a pair of aluminum-framed glass doors centered in the long glass wall. This is in contrast to the McCormick House which is entered from the side brick wall adjacent to its carport. The Greenwald House does not have a carport. The owners use a detached two-car garage located down the hill from the house.

# In the End

Despite the repeated promotion of the McCormick House in sales brochures over the years, and headlines in the news, the prototype did not gain enough interest from the targeted middle-class buyers.

Cost was a significant issue. The average cost of a single family home in 1955 was about $10,500. A steel framed house by Mies would cost three times that amount. Originally Greenwald had hoped the price would land around $12,000, but did not happen because of restrictions on steel at the time, as well as the time needed to build custom pieces for the home.

Chicago Daily Tribune
THE WORLD'S GREATEST NEWSPAPER

**Neighborhood Section**

Thursday, June 21, 1951 Part 5—Page 1 S

The architect looks at plans for small homes to be constructed of glass and steel. Models of home units are on desk.

Chicago Daily Tribune, June 23, 1951, Neighborhood Section, Part 5--Page 1

Carport (McCormick House), Courtesy of Hedrich Blessing Archive, Chicago Historical Society

Another possible reason is that the design was just too different to appeal to the general public. This cutting edge, high-end, forward thinking house was marketed primarily to a very conservative group of people.

The primary competition to the Mies's prefabricated houses was the standard ranch home. Like the row houses, they were one-level without basements and with no usable attic space. They featured large picture windows and sliding glass doors, creating the connection from the home to the surrounding yard. But they had several advantages: garages, more closet space, and they could be built cheaply and quickly.

# McCormick House and more

Exhibition: McCormick House/Past, Present, Future

Exhibition: McCormick House-1952-1959

Exhibition: Mies's McCormick House- Revealed New Views

**Chicago Tribune-** A less-is-more restoration of a Mies house expands our view of a little-known episode in the famed architect's career" by Blair Kamin

**Chicago Architect-** Elmhurst Art Museum McCormick House Renovations: Liberating a Little-Known Mies House by Chelsea Ross

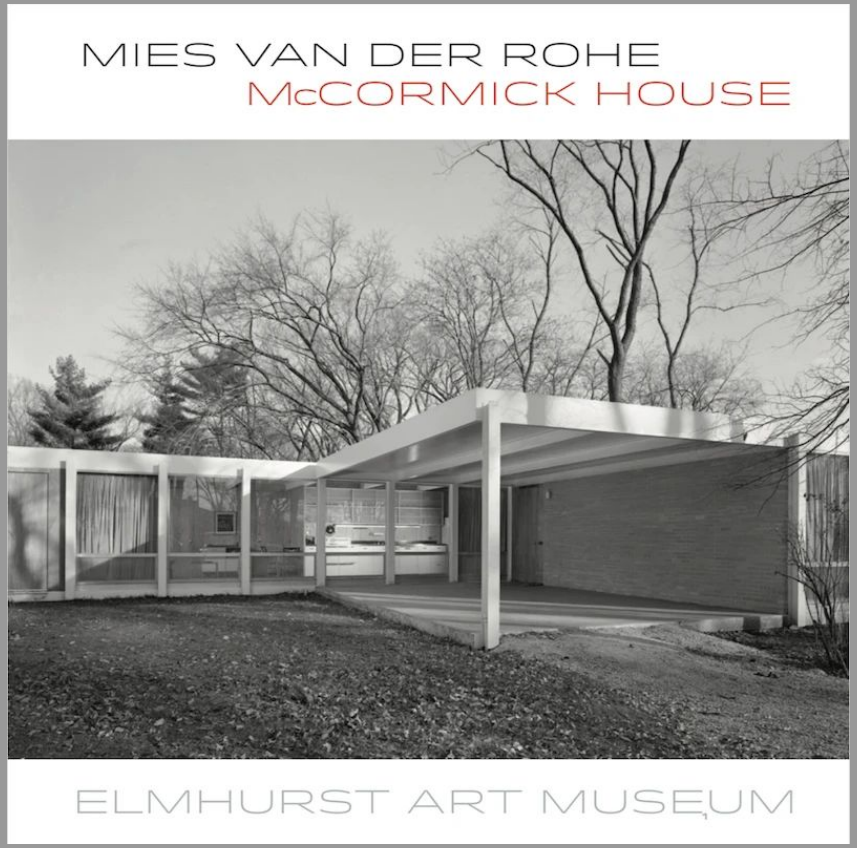
**Chicago Tribune-** Elmhurst Art Museum opens Mies van der Rohe exhibit by Graydon Megan

**Newcity-** Suburban Modernism: Behind the Restoration of Mies' McCormick House by Vasia Rigou

**WDCB The Arts Section-** Polishing An Architectural Gem by Gary Zidek

# From Home Art Activity

CLICK HERE




# MUSEUM STORE

The first official catalog about the McCormick House, published on the occasion of 2018 carport restorations and exhibitions dedicated to the designs of Mies van der Rohe.

The 36-page soft cover catalog contains new scholarship on the McCormick House as well as little-known prefab designs proposed by Mies for the western Chicagoland suburbs. An extensive 4,000 word essay was written by Barry Bergdoll, Meyer Schapiro Professor of Art History at Columbia University, who also curated "Mies's McCormick House Revealed: New Views" at the Elmhurst Art Museum.

Online Museum Store

Ludwig Mies van der Rohe, McCormick House, angled view of house and rear yard. 1952, Hedrich Blessing Archive, HB15690A, Chicago Historical Society

Thank you to Heritage Architecture Studio, Inc. and Barry Bergdoll for their research on the McCormick House.

**Online content created by**

Sarah Franklin, Exhibition Manager
Joe Hladik, Director of Education & Grants Administrator
Maria Vargas, Education Fellow
Julie Rosenberg, Manager of Membership Services and Visitor Experience