

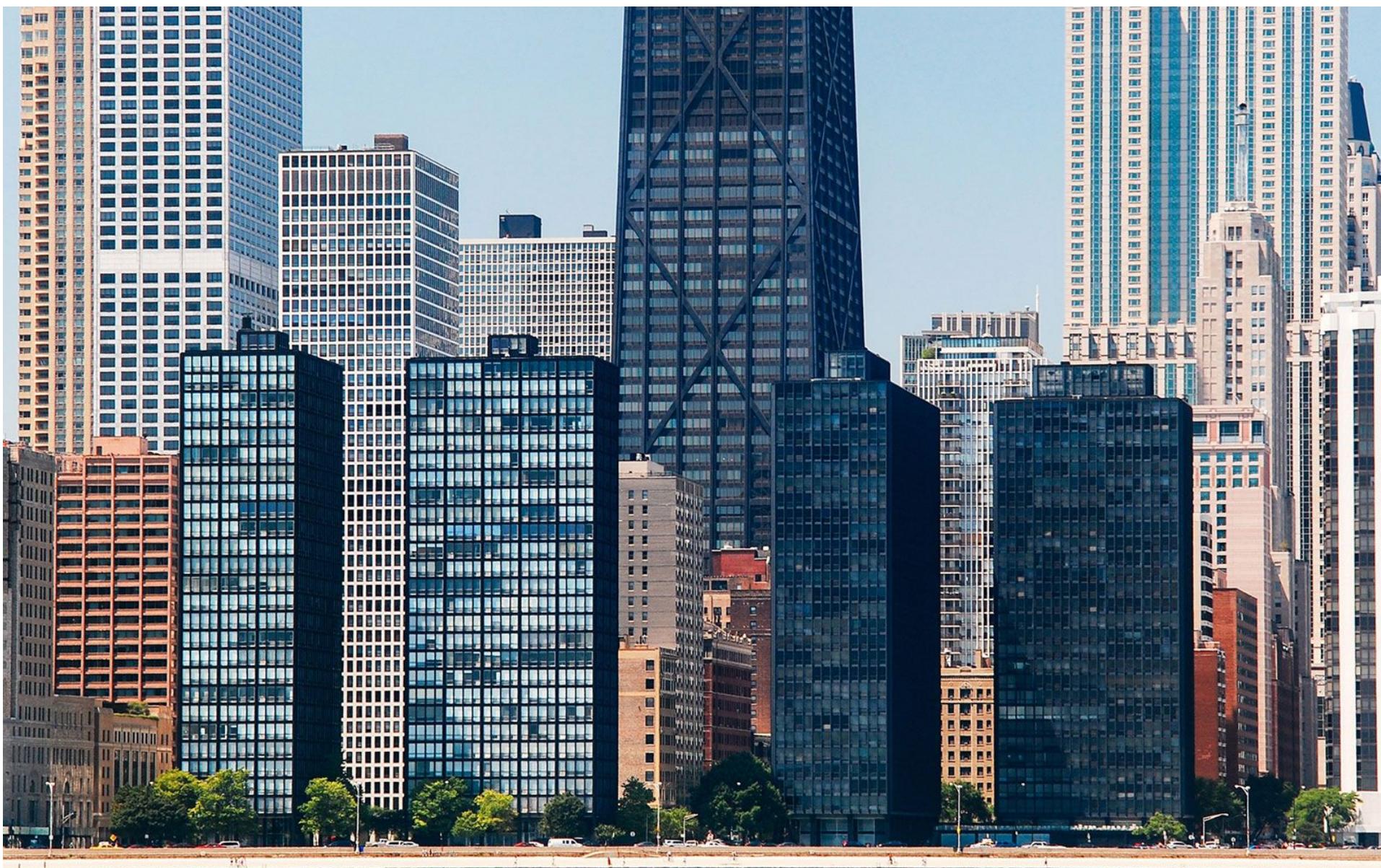
Module III

Later Modern Architecture

International Style

- The International Style is often thought of as the "architecture of the machine age," which symbolized for many the crystallization of modernism in building design. This became particularly true after World War II, when the postwar economic building boom made the International Style a kind of "unofficial" American architecture.
- Often called "minimalist" architecture, International Style buildings are well-known for the way they seem to strip away all extraneous ornament from the structure, leading to an extreme blurring of interior and exterior space, the exposure of buildings' construction with unvarnished honesty, and the glorification of modern industrial materials: chiefly, steel, concrete, and glass.
- The International Style was one of the first architectural movements to receive renown and be adopted unequivocally on every inhabited continent. It became a global symbol of modernity both before and after World War II, especially in Latin America and Asia, where nations felt a keen desire to industrialize and compete politically and economically with traditional powers in Europe and North America.





Post Modernism

- a late 20th-century style and concept in the arts, architecture, and criticism, which represents a departure from modernism and is characterized by the self-conscious use of earlier styles and conventions, a mixing of different artistic styles and media, and a general distrust of theories.
- It emerged in the 1960s as a reaction against the austerity, formality, and lack of variety of modern architecture, particularly in the international style advocated by Le Corbusier and Ludwig Mies van der Rohe.



Inntel Hotel, Netherlands, 2010, by WAM Architecten

Paul Rudolph

October 23, 1918 – August 8, 1997



Arts and architecture building, Yale University



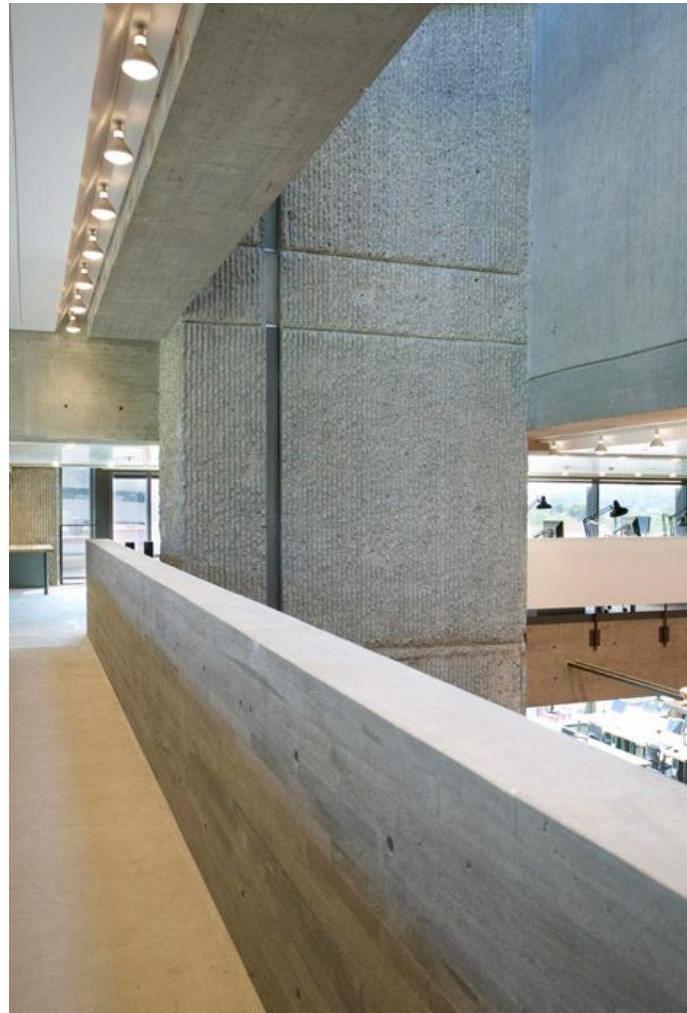
Arts and architecture building, Yale University

- One of the earliest known examples of Brutalist architecture in America, Yale Art and Architecture Building in New Haven, Connecticut, is an imposing, fortress-like building that juxtaposes masses of textured concrete with layers of steel-framed glazing.
- Completed in 1963, the building is formed of intersecting volumes of bush-hammered concrete. Smooth concrete and glass horizontal elements are supported by a sequence of towers that protrude above the roof in a series of turrets.
- The building, now known as Rudolph Hall, occupies a corner site bordered on its south side by road, and on the north by red brick buildings.

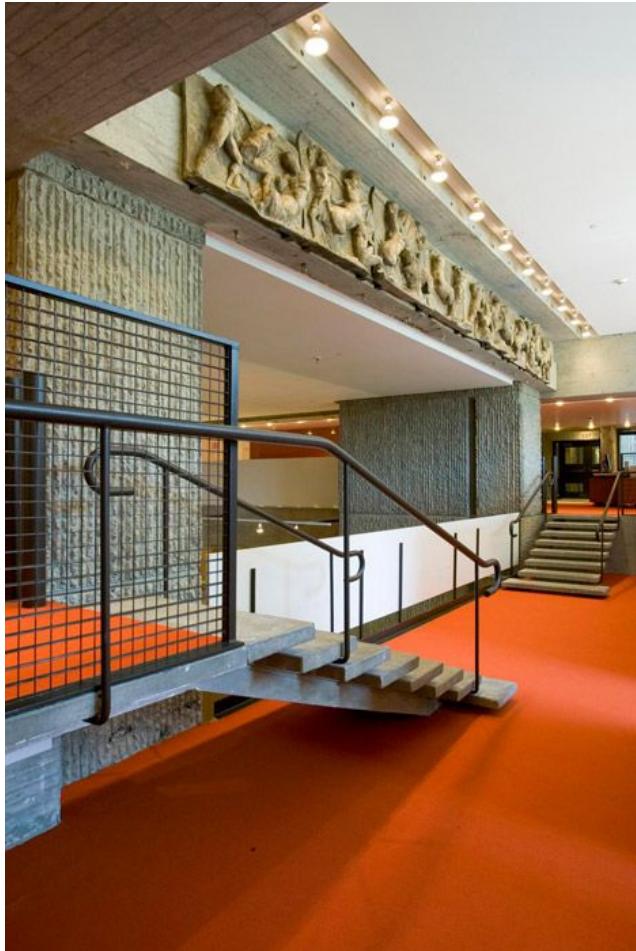


Arts and architecture building, Yale University

- Slabs of ribbed concrete run in vertical sections on the interior and exterior of the 11,000-square-metre building. The concrete was cast in place using corrugated wooden moulds and bush-hammered to expose the aggregate.
- Inside, the complex floor plan is made up of 37 terraced levels spaced across seven main storeys and two basement floors. Each level overlooks a central atrium that features a sunken pit and is topped by a series of skylights, while narrow concrete walkways connect the spaces on either side of the well.
- The main entrance is set back from the street, accessed through a chute and stairwell between two concrete columns.



Arts and architecture building, Yale University



Arts and architecture building, Yale University



Orange County Government Centre, New York

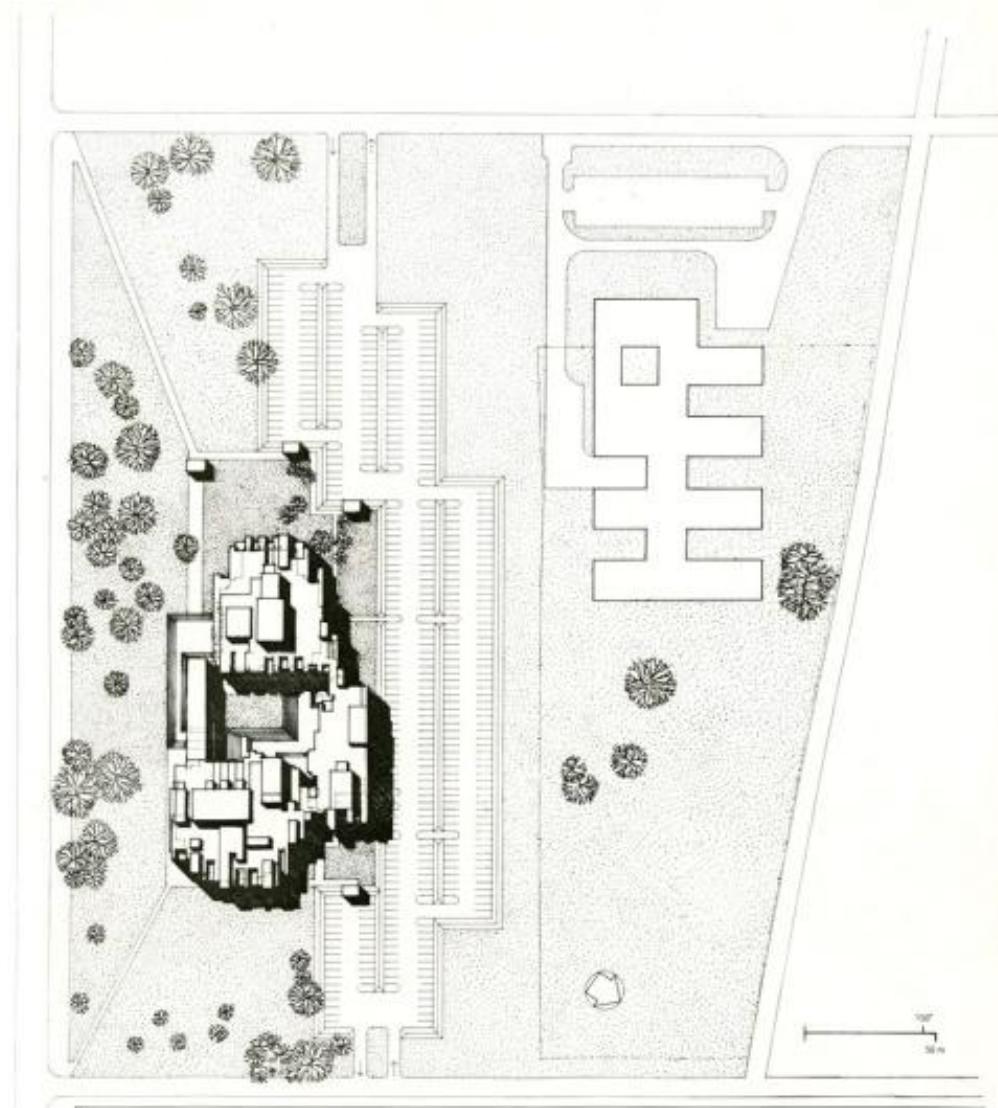


Orange County Government Centre, New York



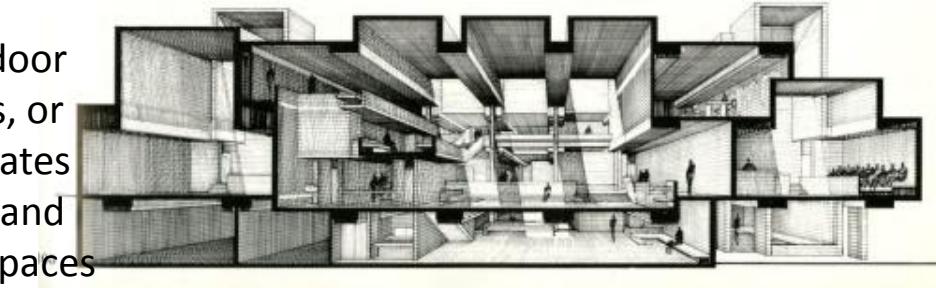
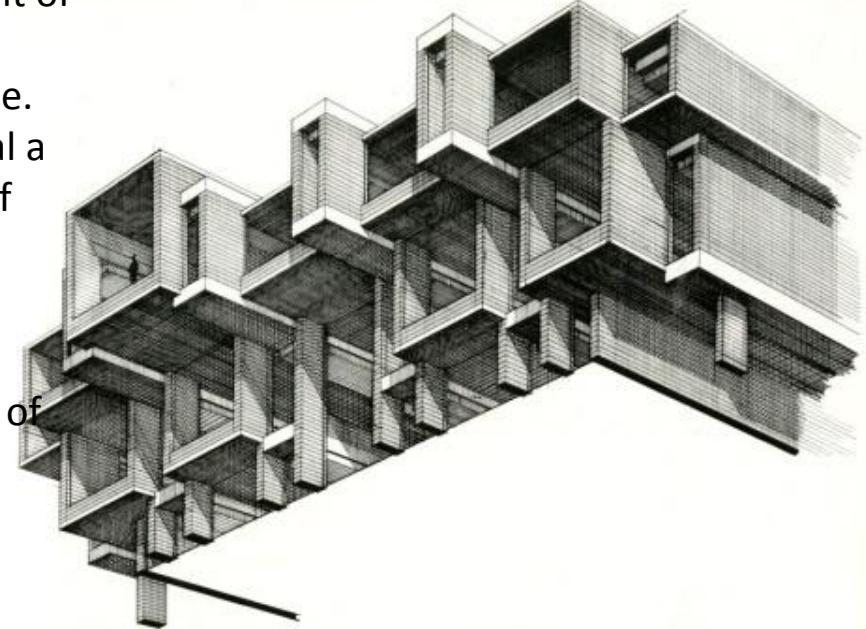
Orange County Government Centre, New York

- The organization of this complex group of government offices and courts, requiring the creation of separate areas for juvenile courtroom, adult and offices for civil and judicial administration.
- The architectural solution was to design three groups of buildings, for each of the three different activities, around a courtyard, linking access through a pavilion and a driveway that frame the general admission.
- The original project consisted of three interconnected buildings, each with a different function. These buildings surrounding an open courtyard that allowed the entry of natural light into the interior spaces and also acted as the main entrance of the three buildings.



Orange County Government Centre, New York

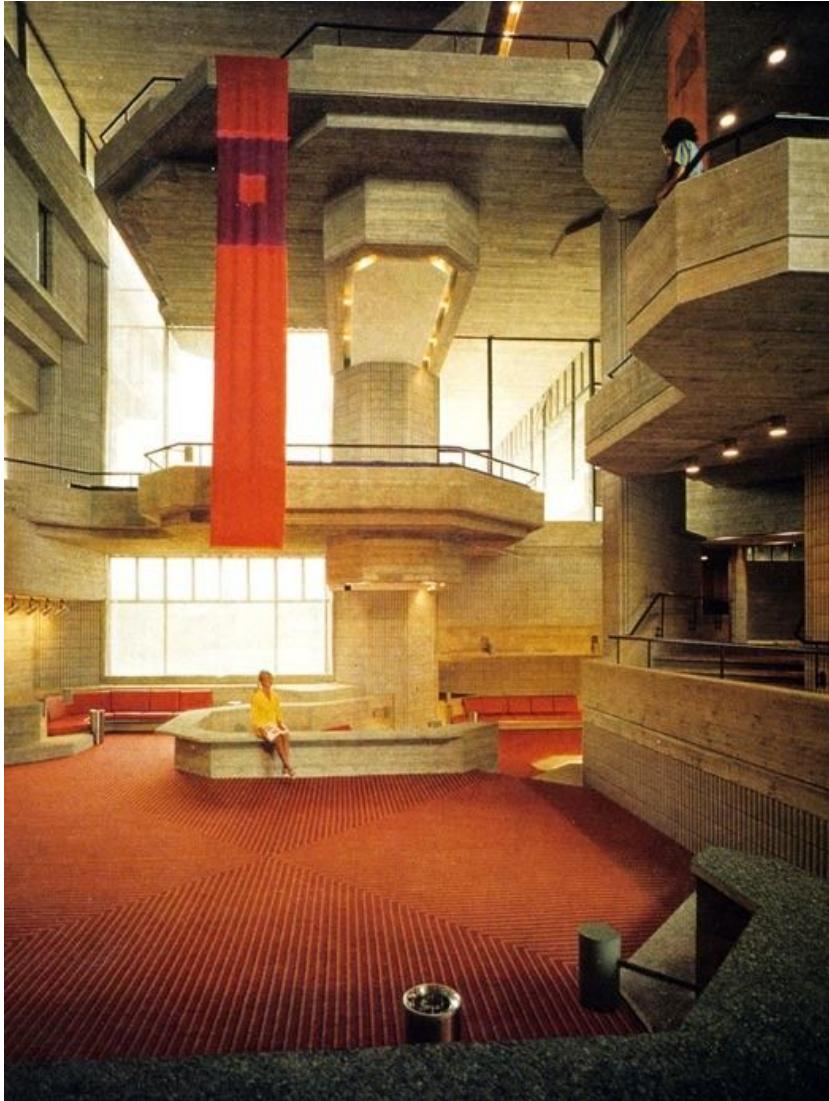
- The volumes, clearly brutalist style, are the result of the interpretation by Rudolph the concept of “implicit space” developed by Mies van der Rohe. The construction plans, highly articulated, reveal a clear concept, almost mathematical approach of space, light and structure of the architect.
- The Orange County Government Center is comprised of three interconnected buildings concrete, and similar surfaces. There are a total of 76,200 meters square, not including outdoor spaces, ceilings over 80 fixed and 300 windows.
- The whole project was developed following a template alternately narrow and wide spaces, creating a rate of 3:1. Variations of the same pattern extending in all environments encompassing the elements, rooms and outdoor spaces. This system of solid walls or windows, or placing them parallel intersecting planes, creates spatial harmony and focused both internally and externally. The same rate is reflected in the spaces of the courtyard between buildings.



Orange County Government Centre, New York

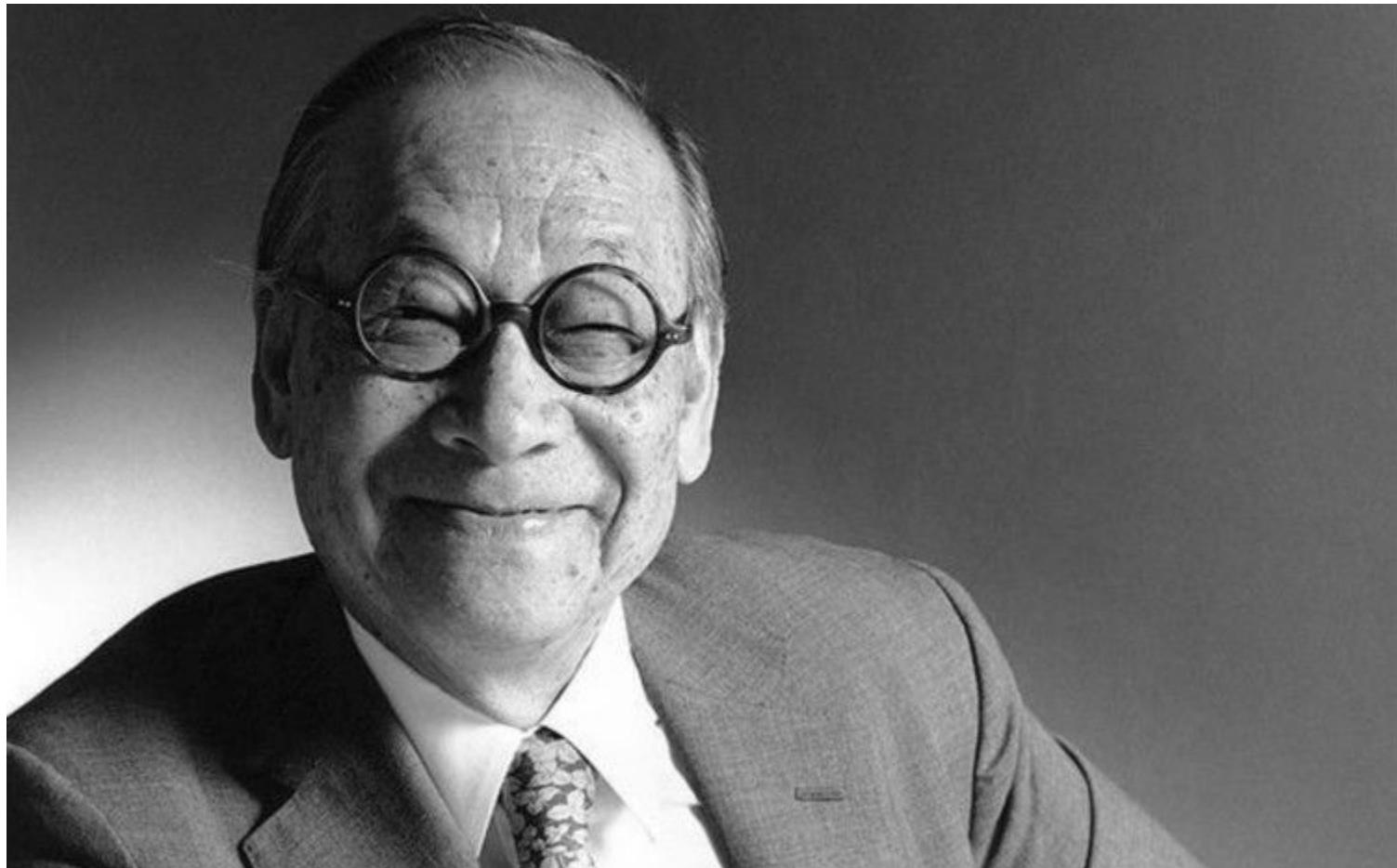


Orange County Government Centre, New York



I.M. Pei

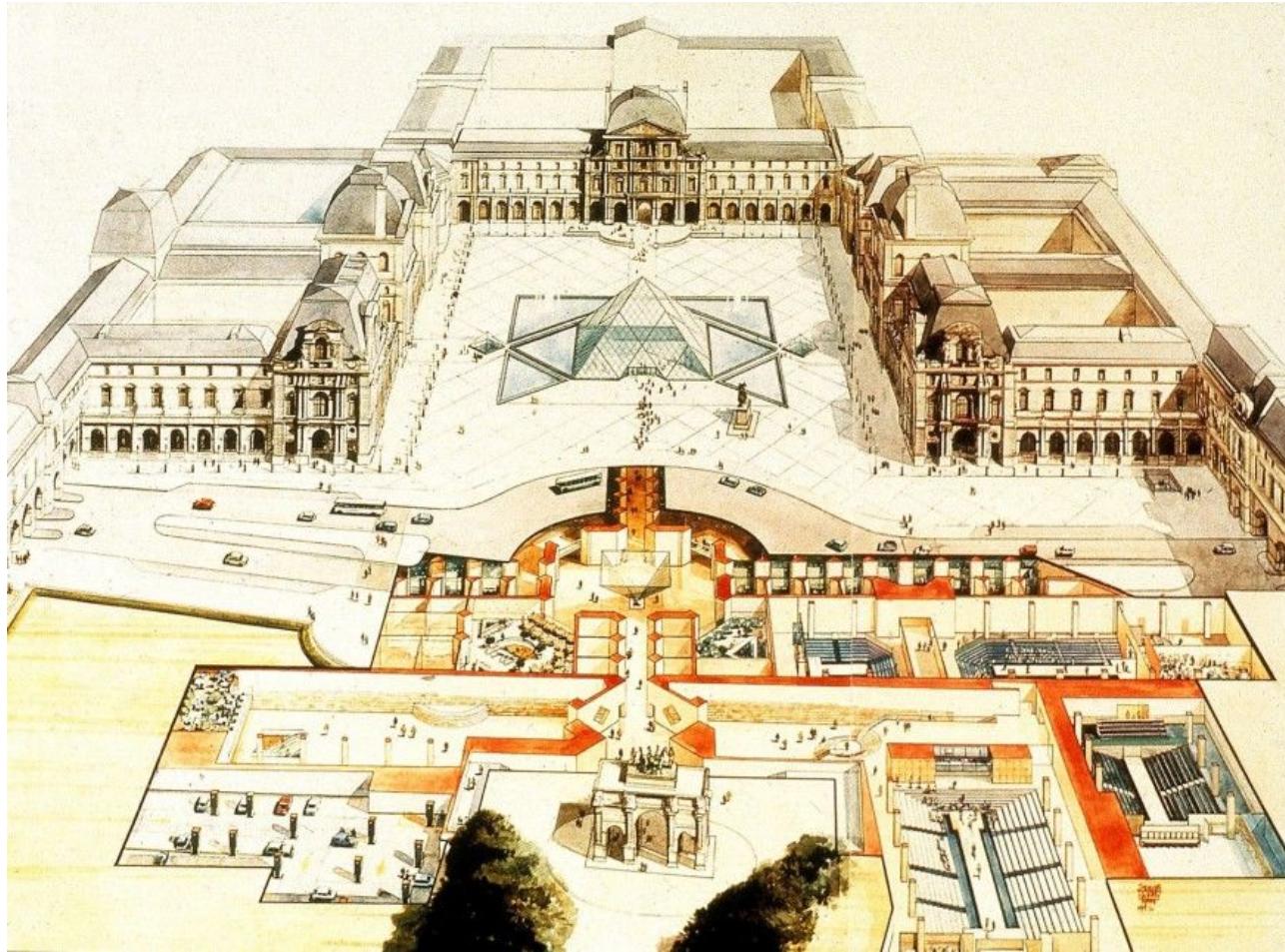
26 April 1917- 16 May 2019



Grand Louvre, Paris



Grand Louvre, Paris

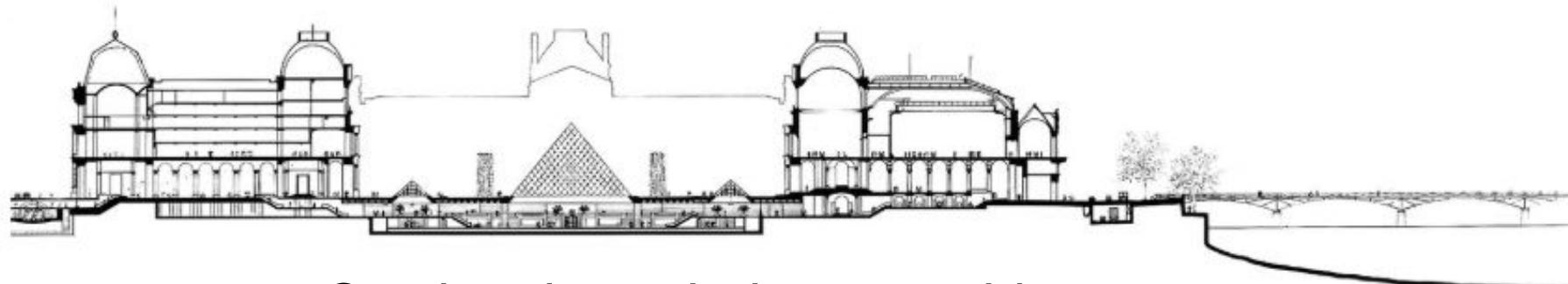


Grand Louvre, Paris

- Completed in 1989, I.M. Pei's renovation redesigned Cour Napoleon, the main court of the Louvre, in order to alleviate the congestion from the thousands of daily visitors. A new grand entrance provided a convenient, central lobby space separate from the galleries, which provided focal point for the cyclical process of one's experience through the museum.
- At its base, the pyramid measures 116 feet wide and 70 feet high. 95 tons of steel and 105 tons of aluminum support the structure.
- The main pyramid is accompanied by three smaller ones. They have been positioned to create light shafts for access to the museum's collections.



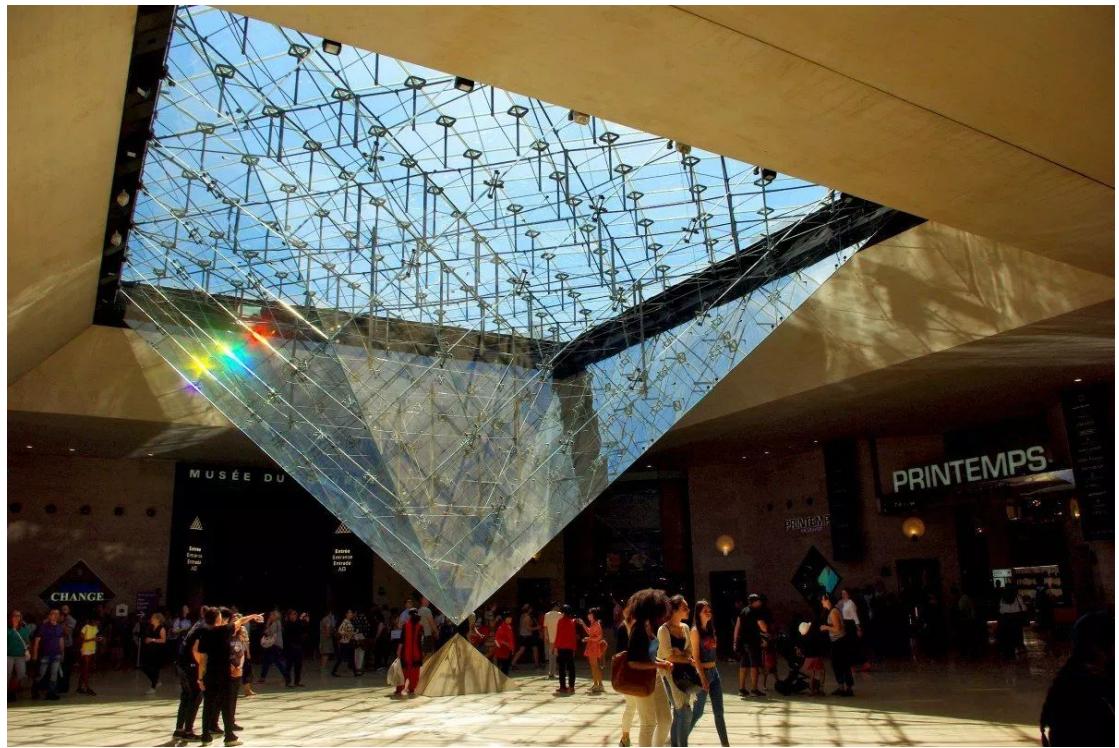
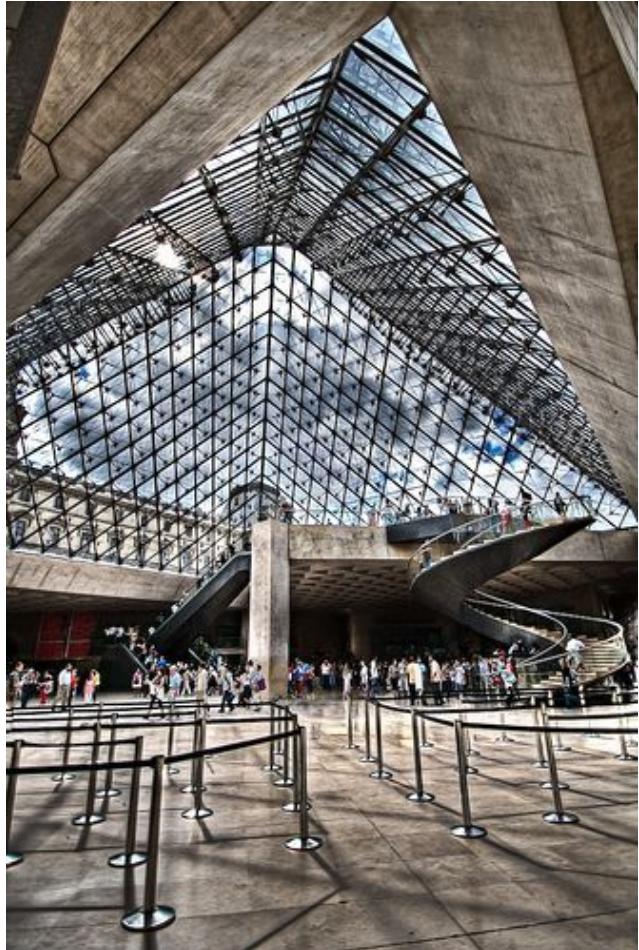
Grand Louvre, Paris



Section through the pyramid



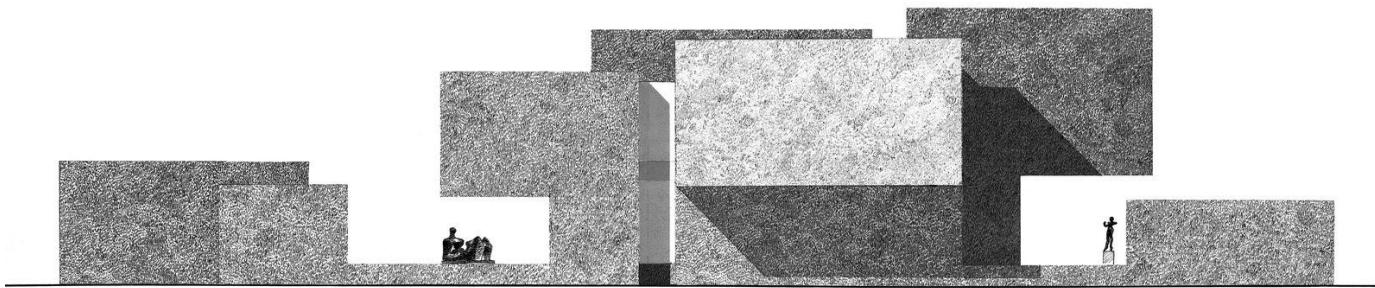
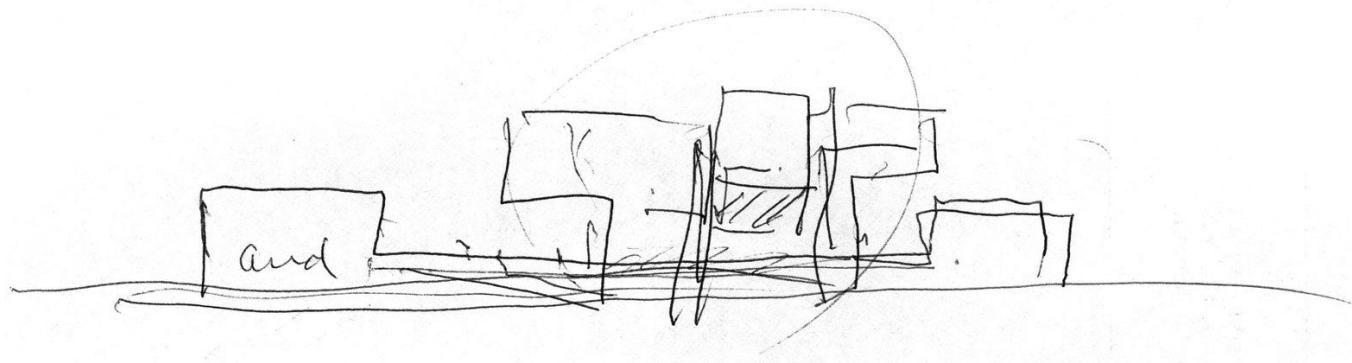
Grand Louvre, Paris



Everson Museum of Art

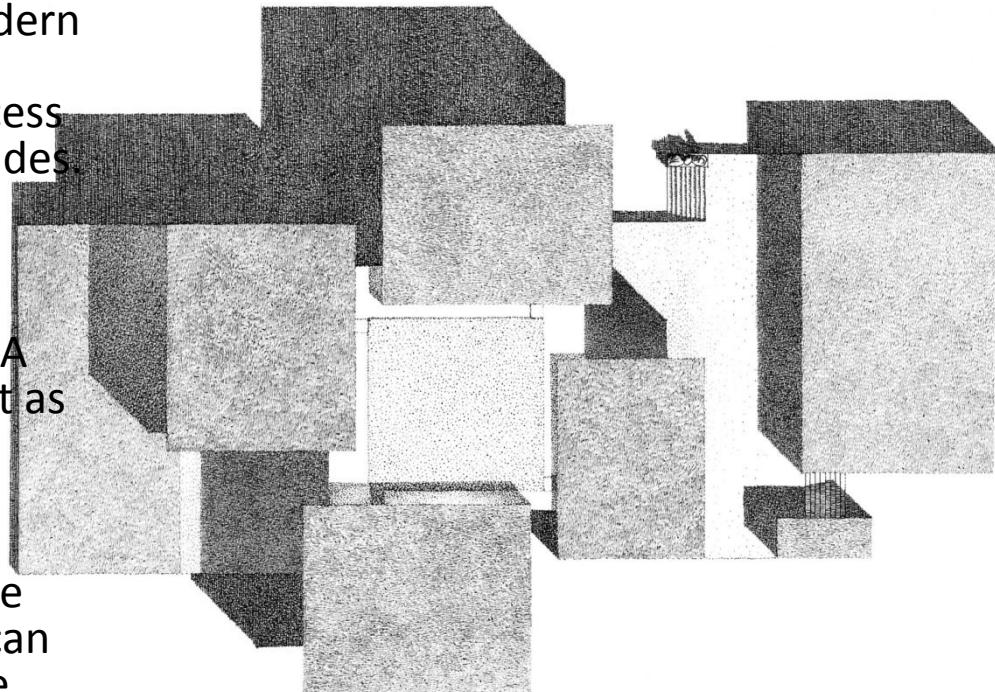


Everson Museum of Art



Everson Museum of Art

- Designed in 1968 by I.M. Pei, the structure sought to simultaneously challenge the traditional museum typology through its innovative form while also existing as an object of modern art in its own right. Pei conceived the Everson as an open structure with access to its interior from all of its exposed sides.
- The building is primarily comprised of four opaque concrete volumes that surround an open atrium that visitors move through to access the galleries. A library/lounge and an auditorium exist as separate volumes that are accessed through the atrium.
- Visitors and natural light enter the building through the gaps between the building's main volumes. Just as one can interact with all sides of sculpture, the Everson acts as a singular form on the pedestal of the open plaza that surrounds it.



Everson Museum of Art



Everson Museum of Art

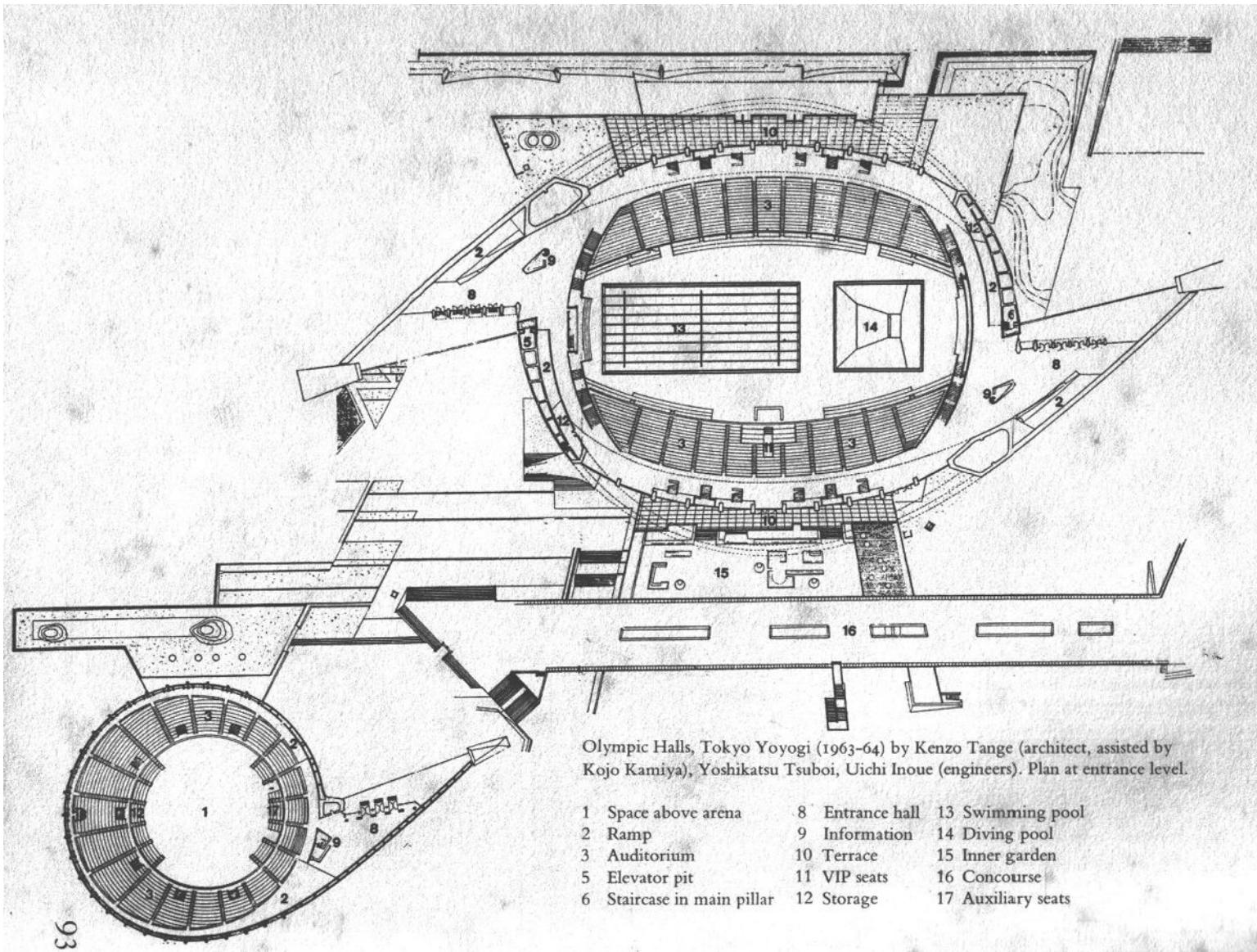


Kenzo Tange

4 September 1913 – 22 March 2005



Olympic Arena, Tokyo, Fuji

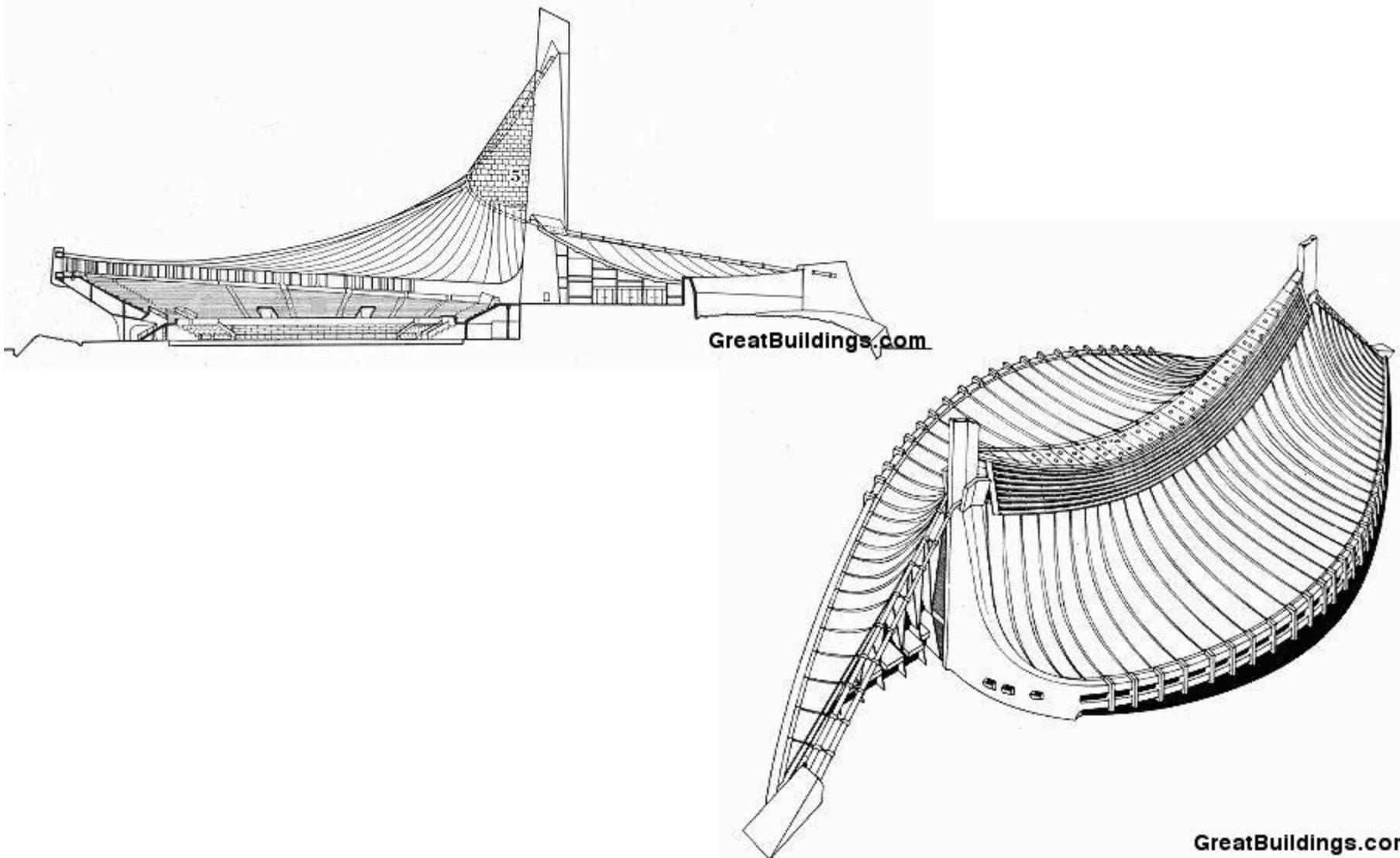


Olympic Arena, Tokyo, Fuji

- "Together with a number of other important projects which Kenzo Tange carried out after 1959, the Olympic stadia in Tokyo can be regarded as the culmination of his career, designed in 1960 and built in 1964, on a par with the highest achievements of the Japanese tradition... The plan [of the larger stadium] is in the form of two semi-circles, slightly displaced in relation to one another, with their unconnecting ends elongated into points. The entrances are located in the concave sides. The roof is supported on two reinforced concrete pillars, and is made up of a system of steel cables onto which enameled steel plates are then soldered. The curving form of the roof serves to make it more resistant to wind, which can reach hurricane force in this region.
- — Udo Kultermann. Kenzo Tange: Works and Projects. p128, 136.



Olympic Arena, Tokyo, Fuji



Olympic Arena, Tokyo, Fuji

- Tange's innovative structural design creates dramatic sweeping curves that appear to effortlessly drape from two large, central supporting cables. Its dynamically suspended roof and rough materials form one of the most iconic building profiles in the world.
- The subtle curves of the structural cables, the sweeping roof plane, and the curving concrete base seem to emerge from the site appearing as one integrated entity.
- The smaller pavilion which holds approximately 5,300 people is used for various small Olympic events, whereas the national gymnasium was designed to be occupied by 10,500 people primarily for the Olympic swimming and diving competitions.
- Two large steel cables are supported between two structural towers in addition to being anchored into concrete supports on the ground. The suspended cables form a tensile tent-like roofing structure; a series of pre-stressed cables are suspended off of the two main cables that drape toward the concrete structure that creates the base of the gymnasium as well as providing the necessary structure for the seating within the stadium.

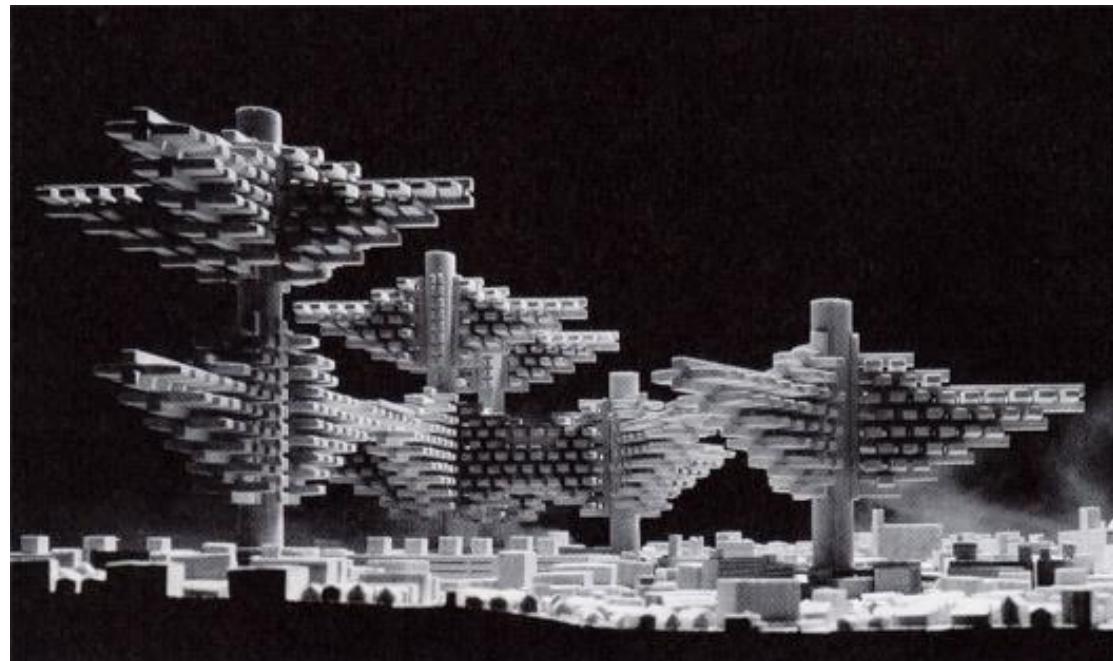
Broadcasting centre, Tokyo

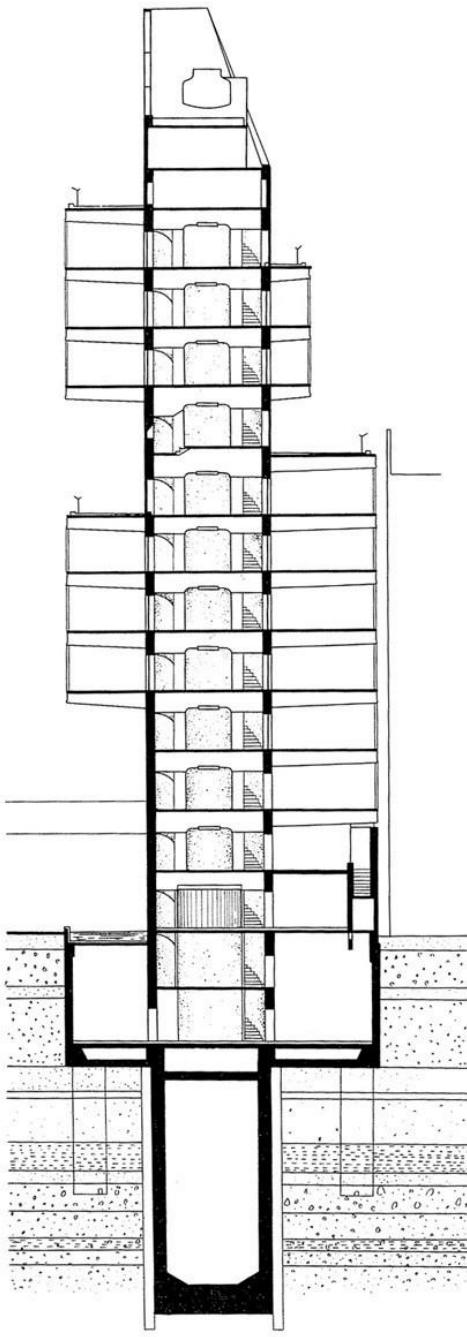
- Built in 1967, the building was the first spatial realization of Tange's Metabolist ideas of organically-inspired structural growth, developed in the late 1950s.
- The Shizuoka Press and Broadcasting Center is far more significant than its relatively small size would suggest, encapsulating the concepts of the new Metabolic order in architecture and urban planning that prevailed in post-World War II Japan.



Broadcasting centre, Tokyo

- Built in the Ginza district of Tokyo, the Shizuoka Press and Broadcasting Center gave Tange a chance to materialize his Metabolist ideals, which called for a new urban typology that could self perpetuate in an organic, vernacular, "metabolic" manner. The narrow, 189 square-meter, triangular site inspired Tange to design a vertical structure, consisting of a main infrastructural core, which could develop into an urban megastructure (a term coined by a fellow Metabolist, Japanese architect Fumihiko Maki), into which an ever-growing number of prefabricated capsules could be "plugged-in."

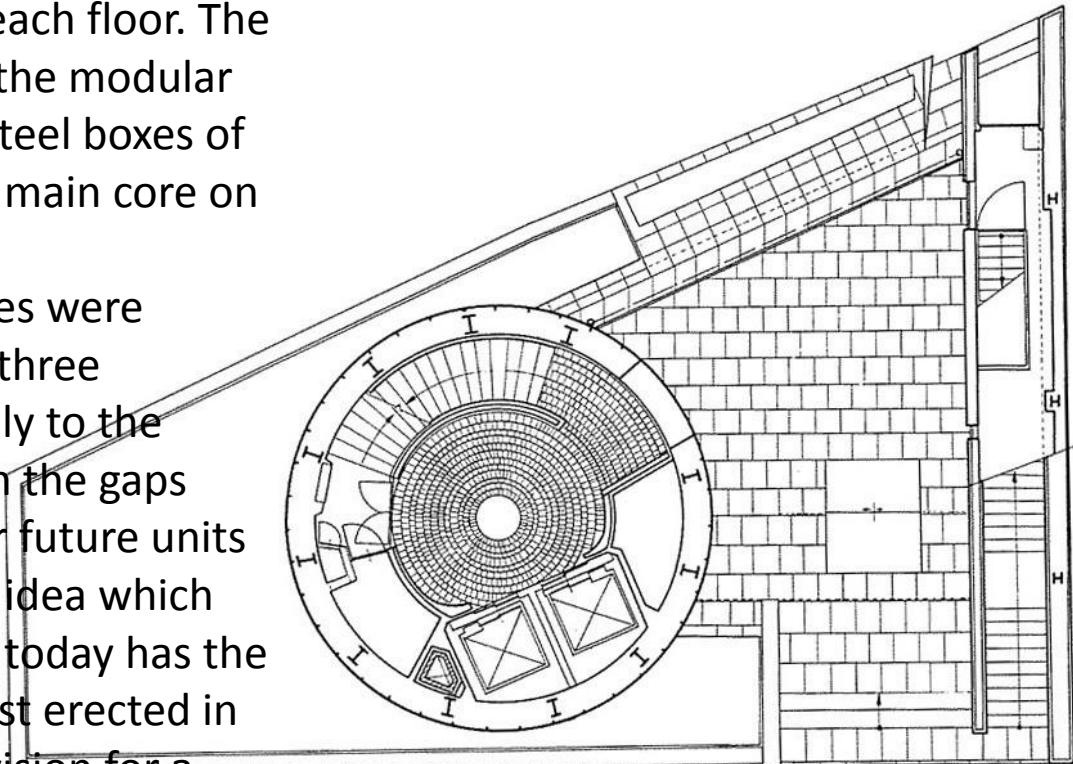




Broadcasting centre, Tokyo

The infrastructural core was a 7.7 meter diameter cylinder, reaching a height of 57 meters, containing stairs, two elevators, and a kitchen and sanitary facilities on each floor. The core served as an access shaft to the modular office units: cantilever glass and steel boxes of 3.5 meters which punctuated the main core on alternating sides.

A total of thirteen individual offices were arranged in five groups of two or three modules connected asymmetrically to the central beam. Balconies formed in the gaps between the clusters, allowing for future units to potentially be “plugged-in,” an idea which never materialized. The structure today has the same amount of units as when first erected in 1967, and so Tange’s Metabolist vision for a perpetually regenerating, prefabricated urban megastructure was never fulfilled.



Minoru Yamasaki

1 December 1912 – 6 February 1986







Dahran International Airport





McGregor Memorial Conference Community Center, Detroit





Kisho Kurokawa

April 8, 1934 – October 12, 2007



The Museum of Modern Art

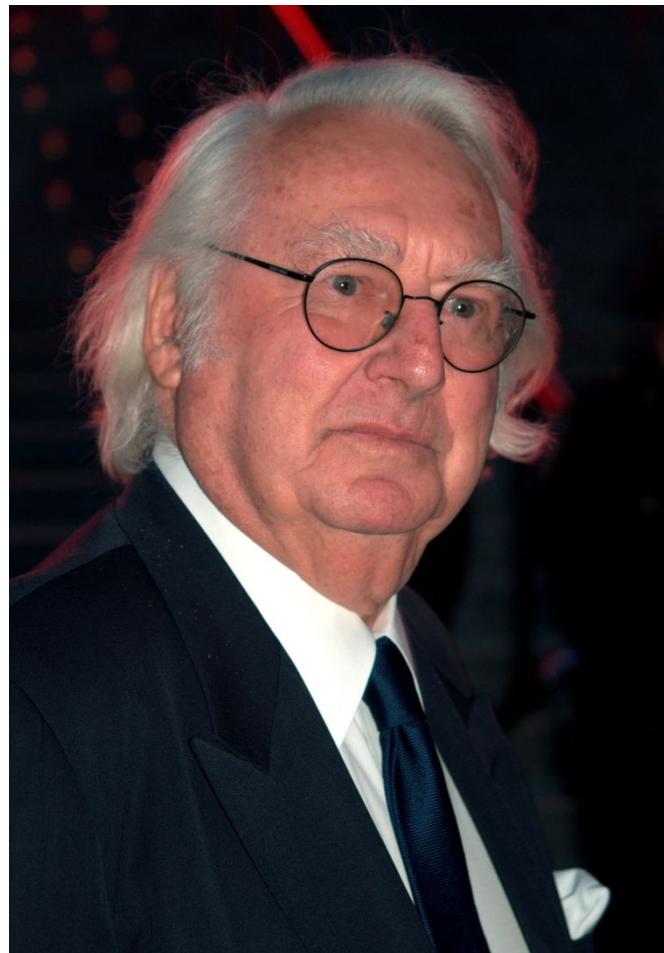


Capsule Tower Tokyo



Richard Meier

Born October 12, 1934



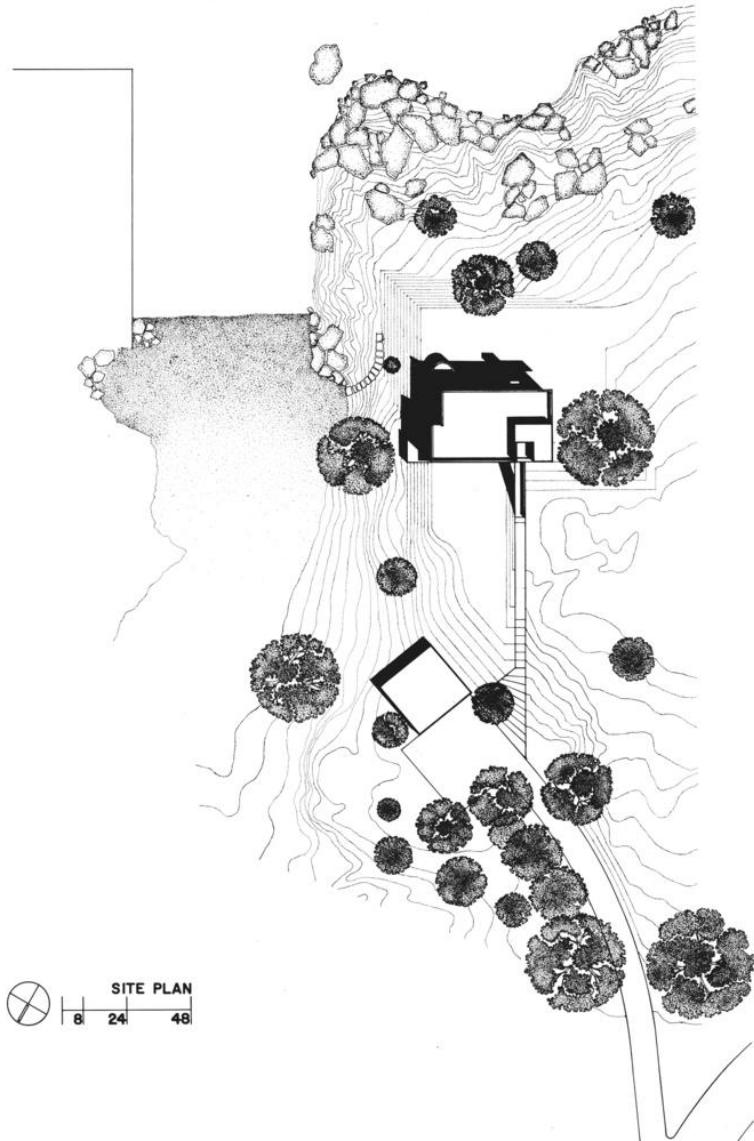
Jubilee Church, Los Angeles



Smith House, Connecticut



 SITE PLAN
8 24 48

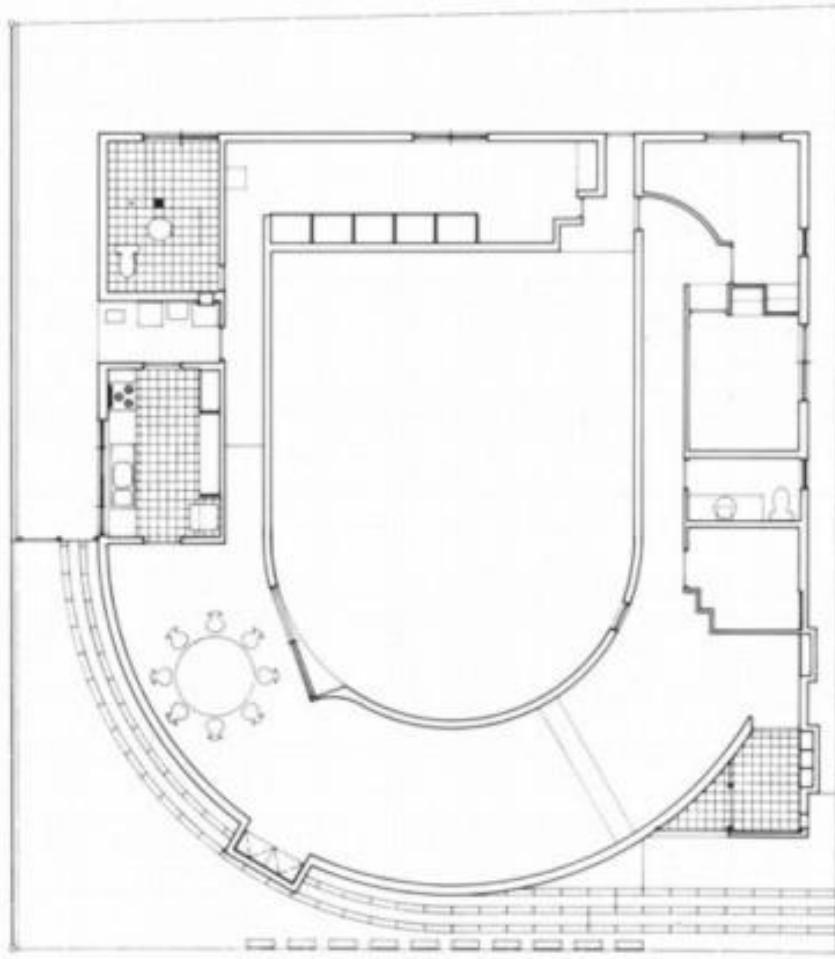
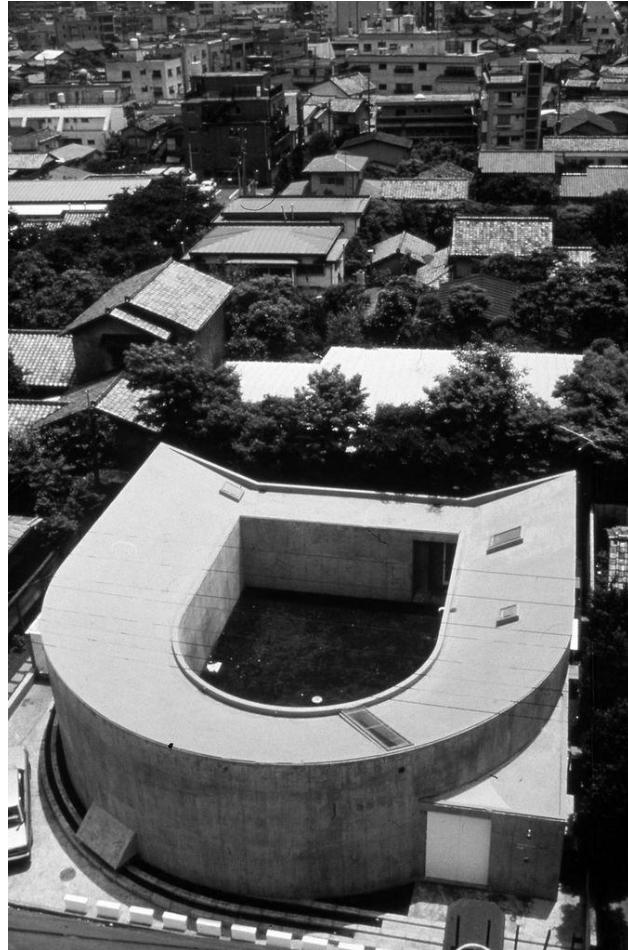


Toyo Ito

born 1 June 1941



U House Tokyo



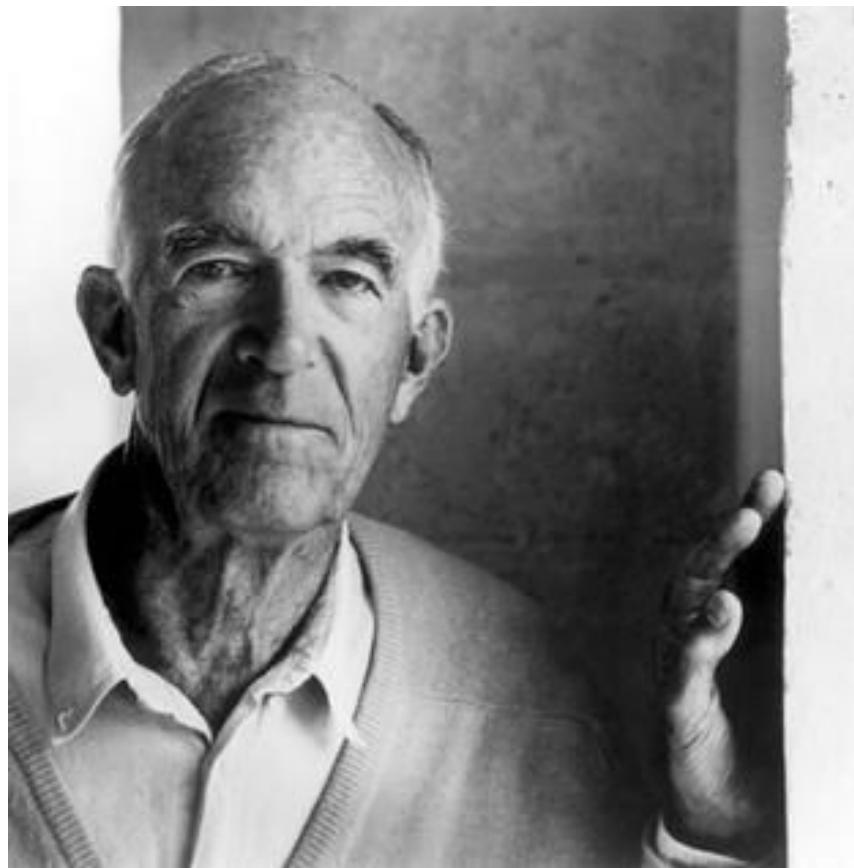
Serpentine Pavilion, London





Jorn Utzon

(9 April 1918- 29 November 2008)



Sydney Opera House



Robert Venturi



Critical Regionalism

- Critical regionalism is an approach to architecture that strives to counter the placelessness and lack of identity of the International Style, but also rejects the whimsical individualism and ornamentation of Postmodern architecture.
- The stylings of critical regionalism seek to provide an architecture rooted in the modern tradition, but tied to geographical and cultural context.



Hassan Fathy

March 23, 1900 – November 30, 1989



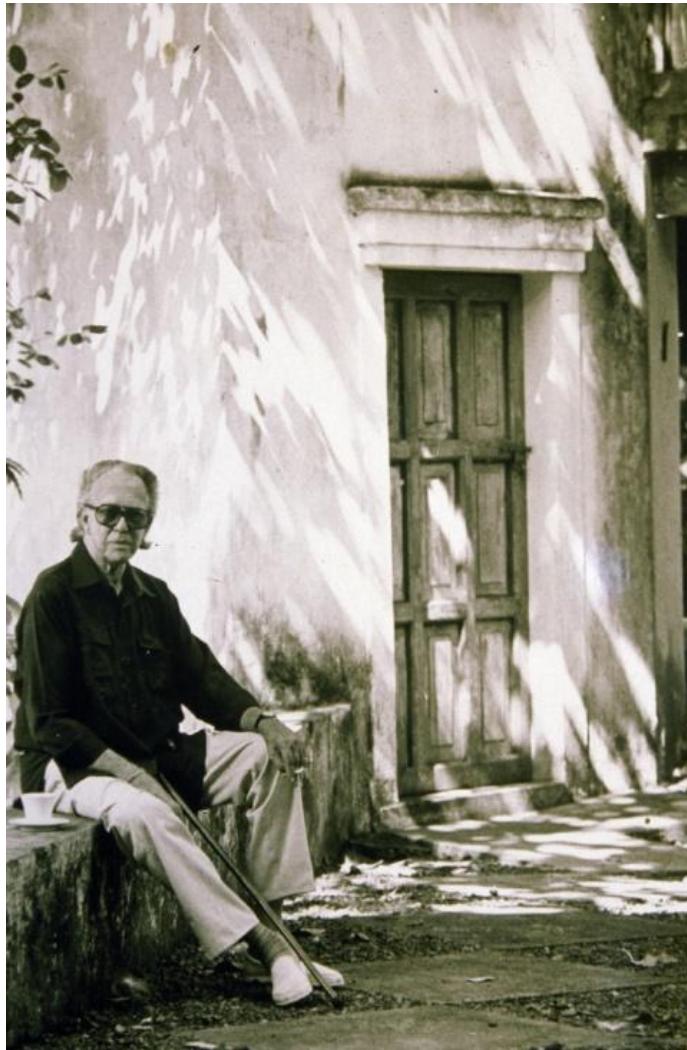
Mosque at Gourna, Luxor,





Geoffrey Bawa

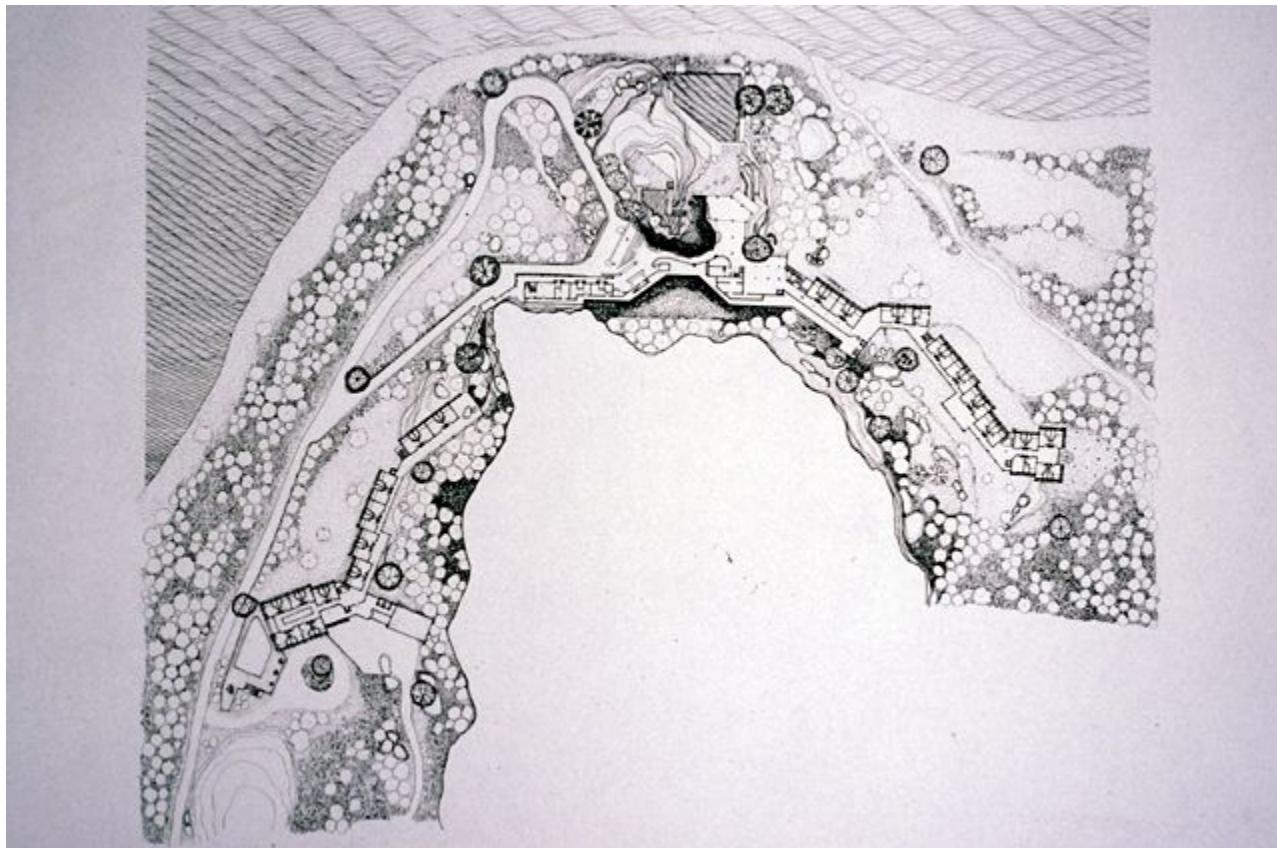
July 23, 1919 – May 27, 2003



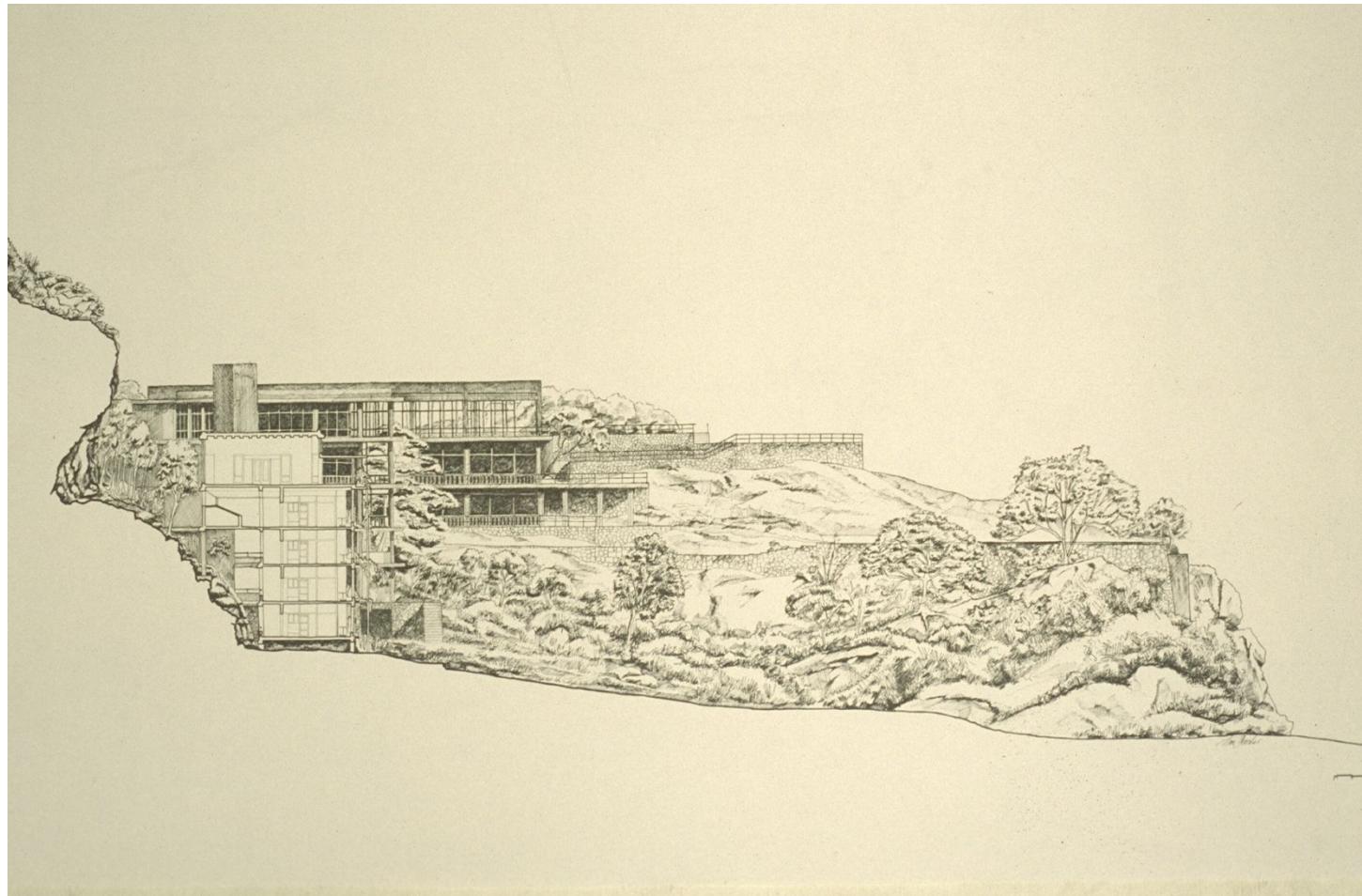
Kandalama Hotel, Dambulla



Kandalama Hotel, Dambulla



Kandalama Hotel, Dambulla

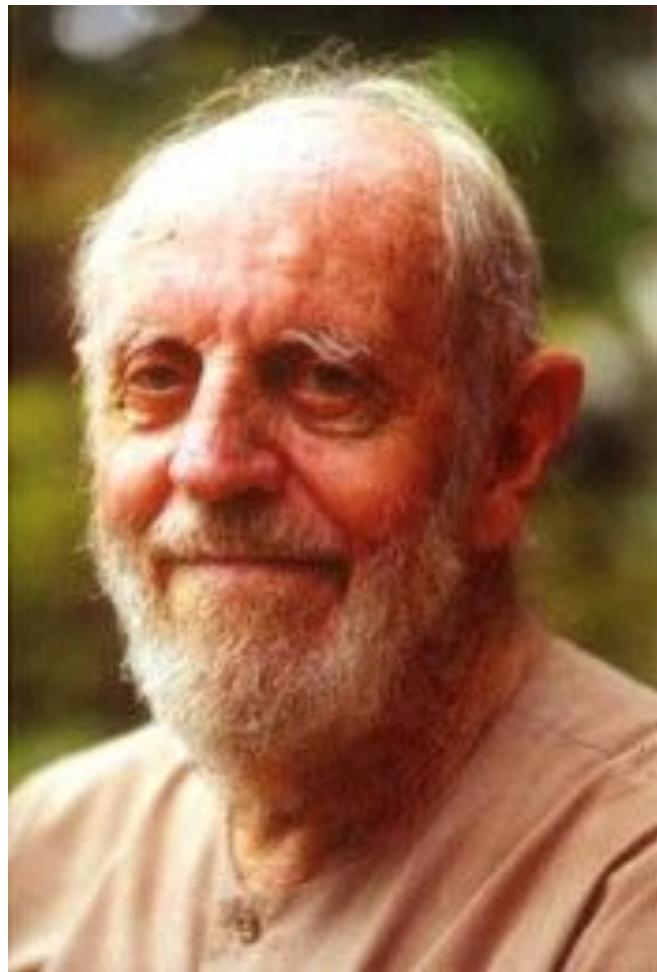


Lunuganga, Bentota



Laurie Baker

2 March 1917 – 1 April 2007



Indian coffee house



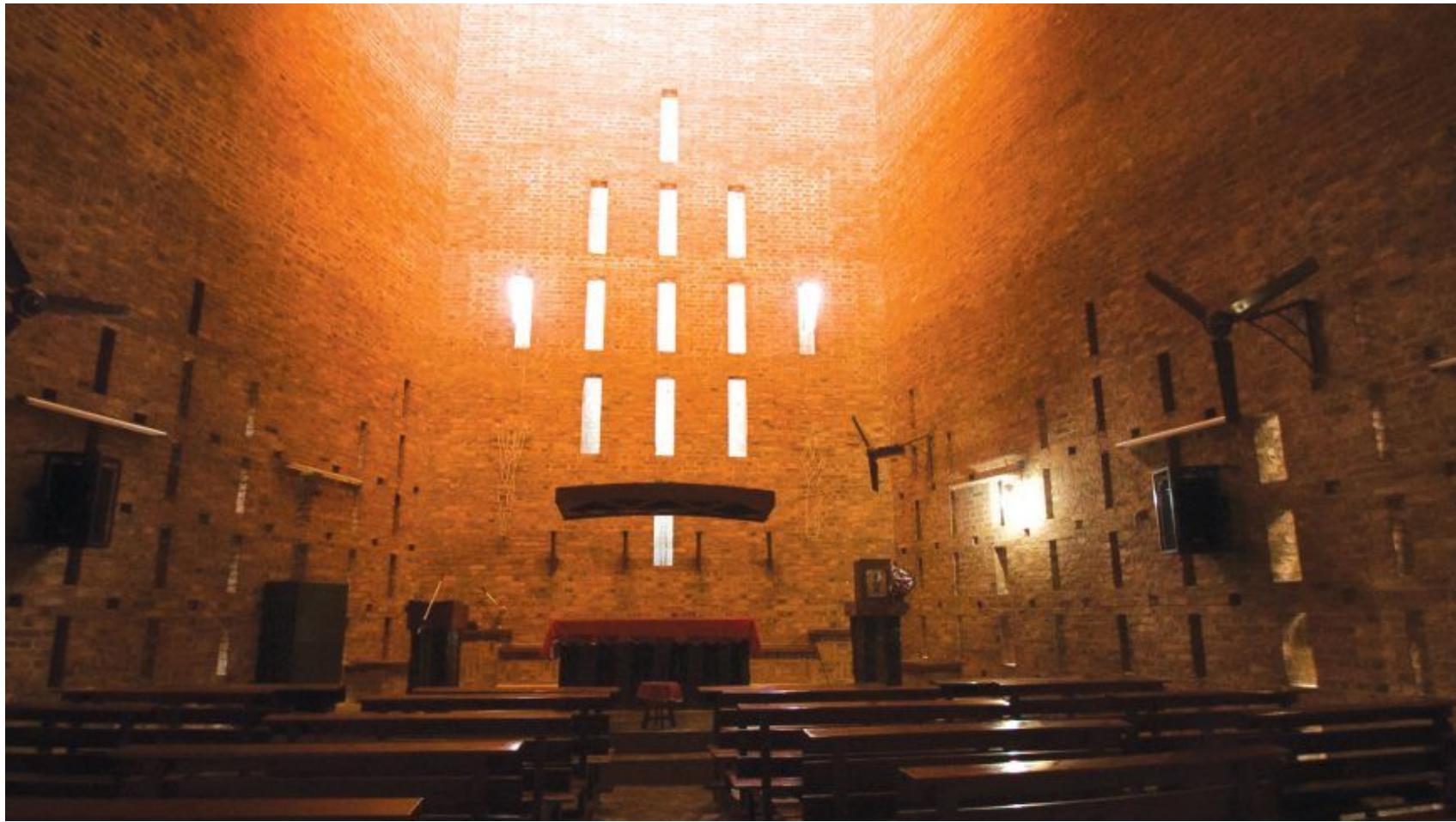
Centre for development studies (CDS)



Centre for development studies (CDS)



Loyola Chapel



Tadao Ando

born 13 September 1941



Church of light,Osaka



Church on the water



Church on the water



Church on the water

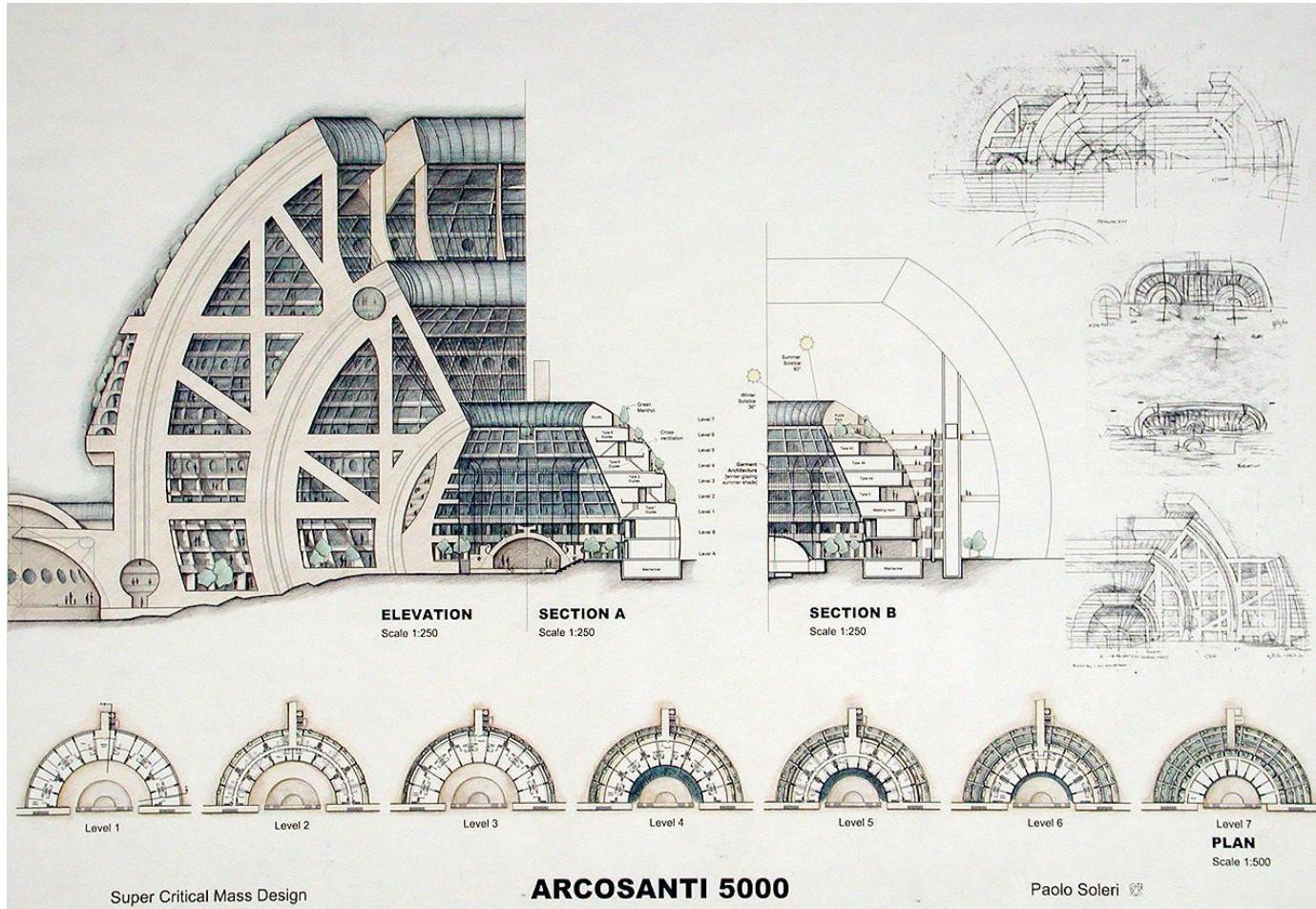


Paolo Soleri

(21 June 1919 – 9 April 2013)

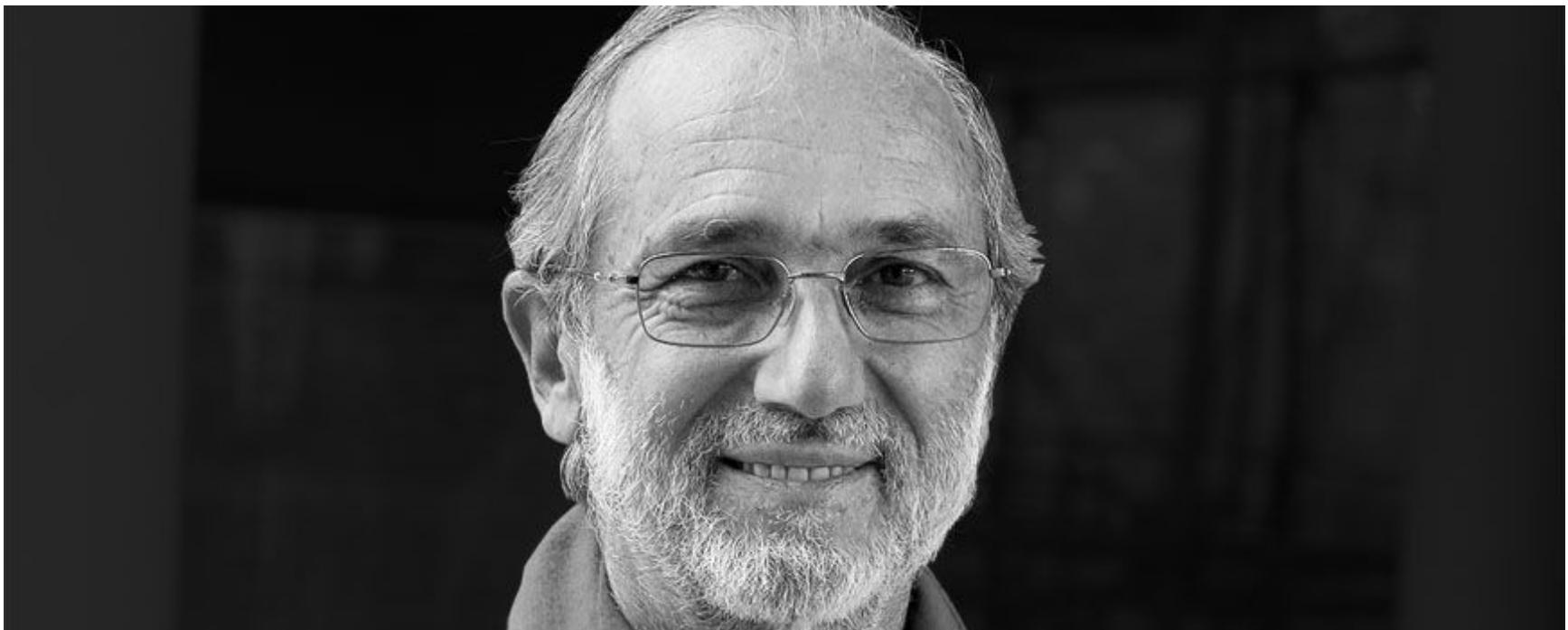




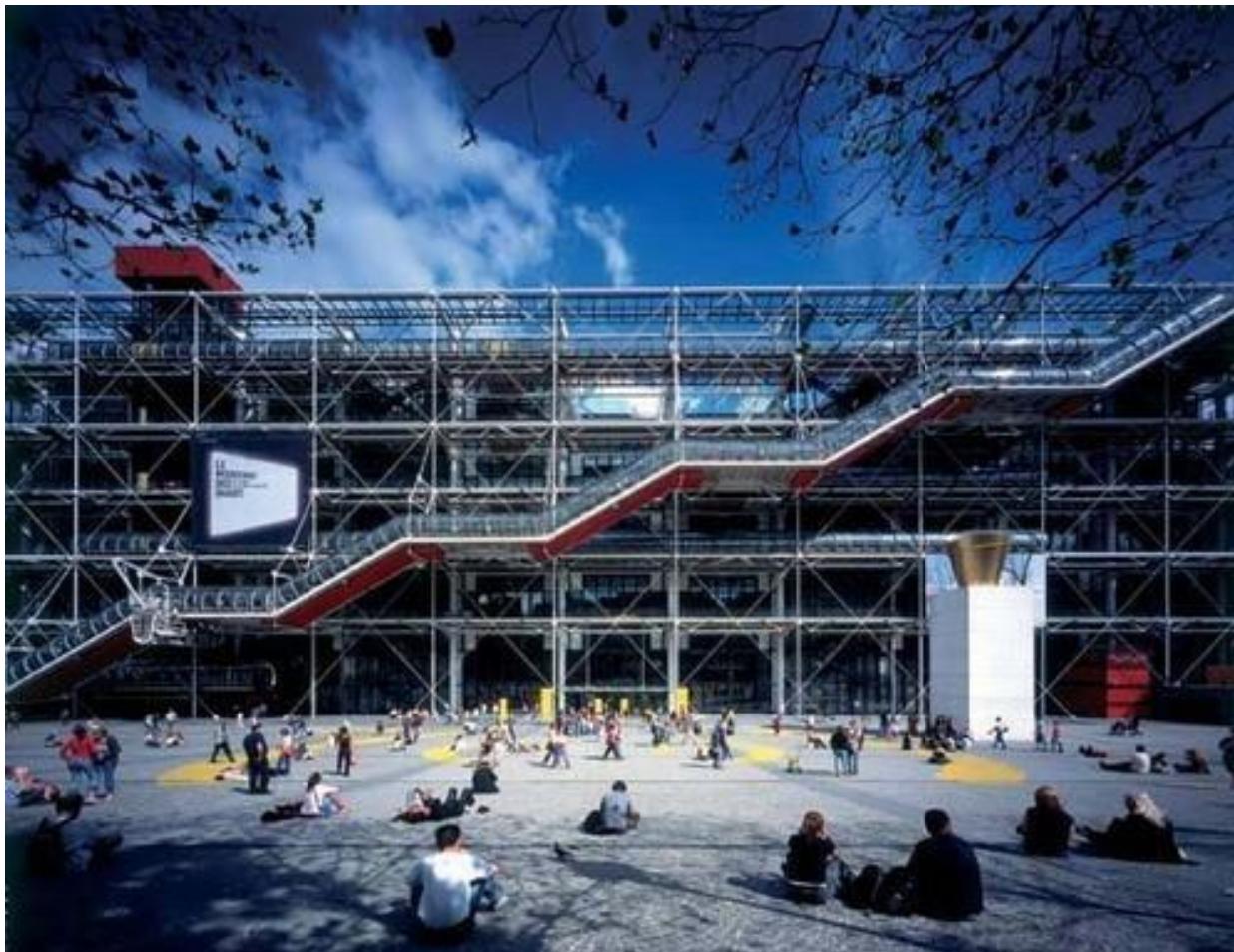


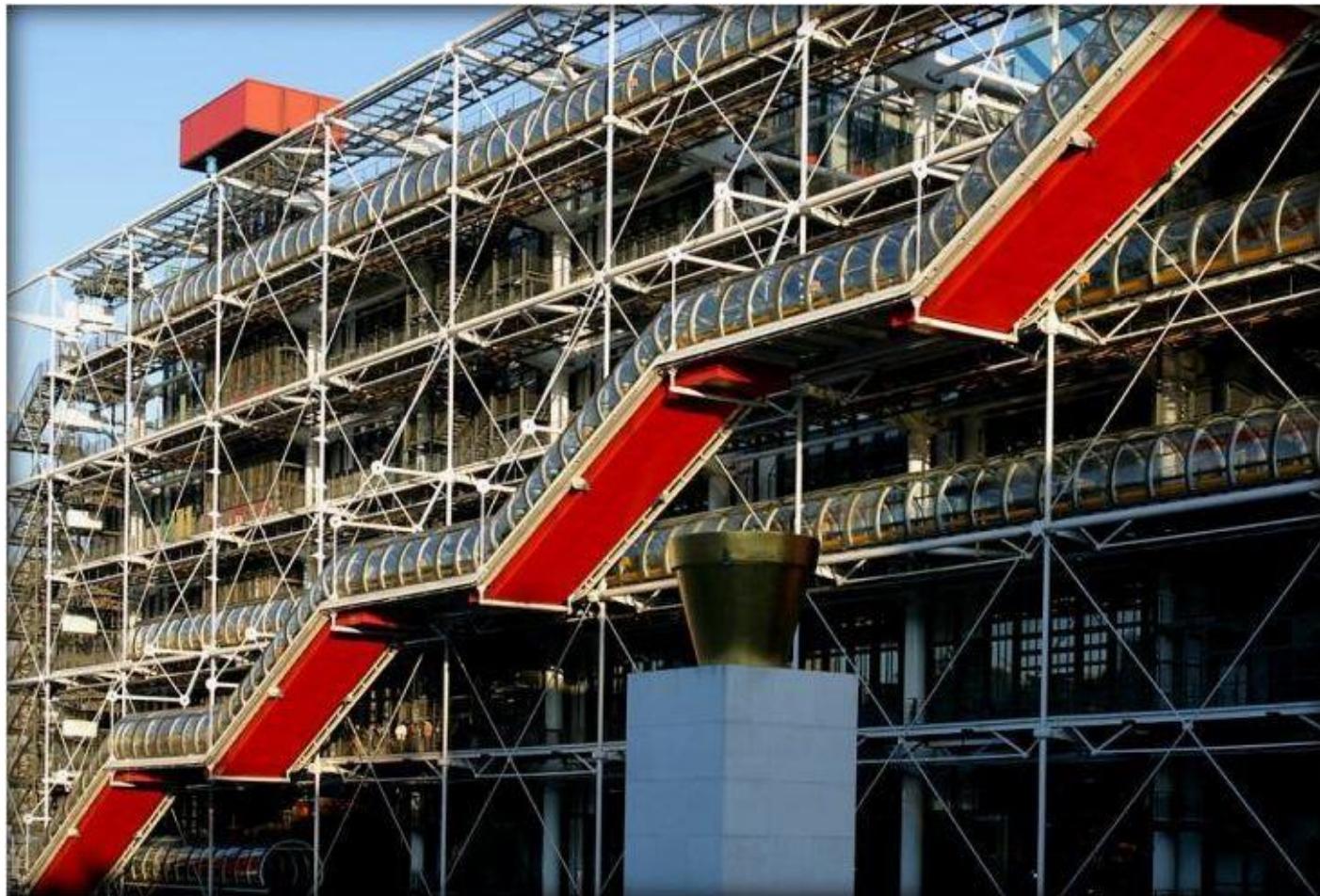
Renzo Piano

(Born 14 September 1937)



Pompidou Centre





Richard Rogers

(born 23 July 1933)



Mario Botta

(born 1 April 1943)



SFMOMA

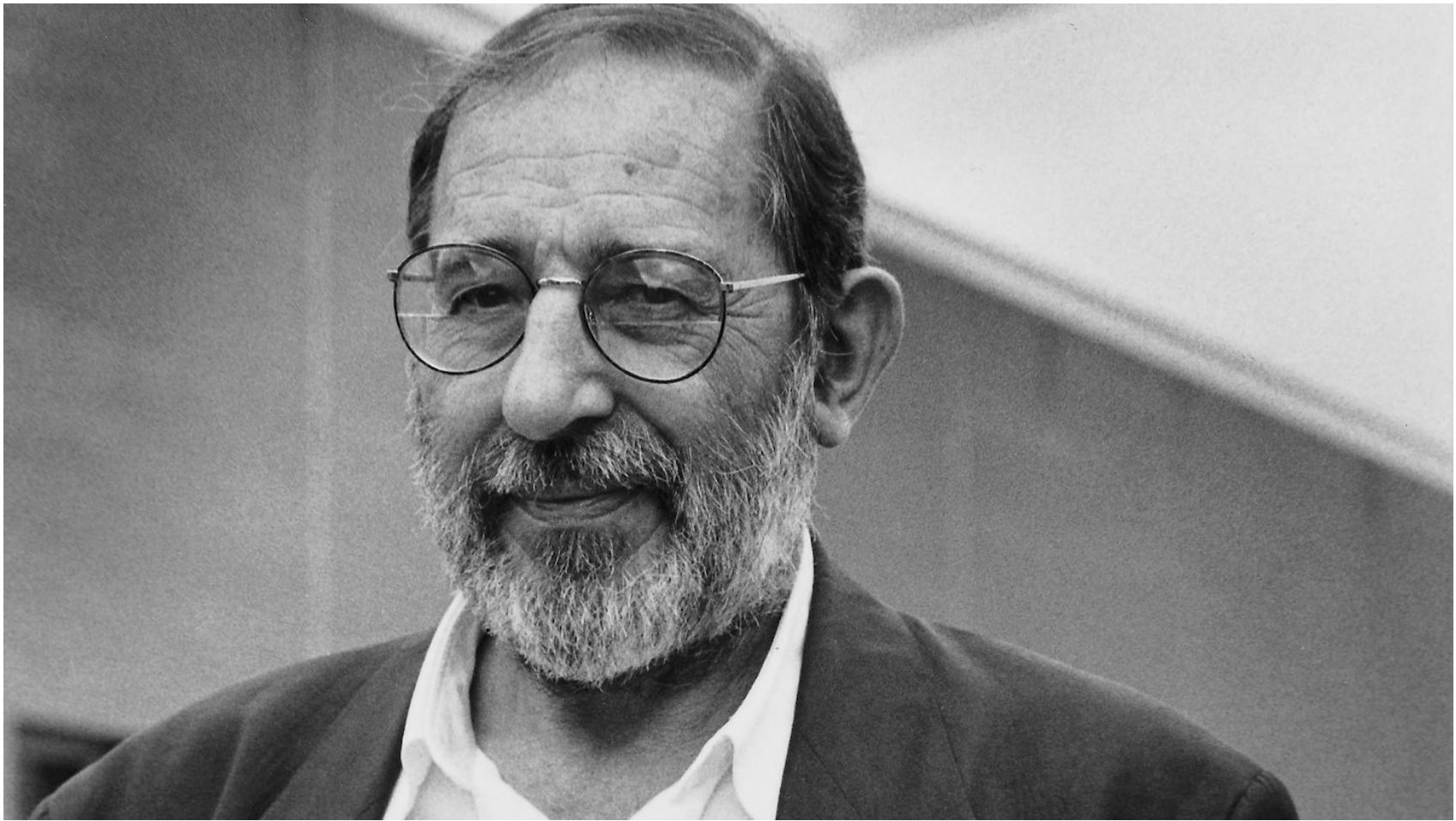


Church of San Giovanni Battista



Alvaro Siza

(born 25 June 1933)



Iberê Camargo Foundation



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