

Architecturally, due to the two longitudinal façades, the building could be described based on levels: the exterior, with *brise-soleils* to filter the light and protect from direct sun, which includes the verandas of the terraces, decorated archways with Islamic motifs on the lower part and wood screens at window level on the apartments; the interior of the terraces, with functional openings, and those of the businesses, set back to form porticos and with metal covered ceiling and transverse arches which contain the ornamentation.

The conceptual layers (which were elaborated in the three dimensional modeling process) constitute the elements, which were represented though engraving or laser cutting according to their function and dimension, as occurred with the ornamental details, to assemble them afterwards in the 1/200 scale model.

## **SADDAM HUSSEIN SPORTS COMPLEX (1955-1965, 1979-1983)**

### **Le Corbusier and George Marc Présenté**

*"The old government had made a significant gesture by calling world renowned architects to Baghdad, that is to say, Gropius for the University, Aalto for the Museum, Ponti for the Minister of Development, Corbu (sic) for the Stadium. At the same time, Washington was hiring José Luis Sert (president of the CIAM and a fanatic of the workshop at 35 Sevres Street where he has worked for five years) for the construction of the American Embassy. We were not there simply by chance." (Letter to J.P. de Montmollin, September 7, 1959)<sup>1</sup>*

By chance...What must Le Corbusier have thought, he, implacable defender of the role of mathematical proportions in architecture, when they told him that they had discovered a Babylonian tablet from the XVII century B.C., inscribed with the Pythagorean theorem<sup>2</sup> (some thousand years before the Greek formulation) precisely on the plot of land chosen to build the Olympic Stadium?

However, it seems that this belated work, built after the death of the architect, does not exist. The studies published in the West do not always mention it. It is not even in the volumes written about the architect's complete works. That being said, the architect's workshop was responsible for more than one hundred and twenty designs.

We are talking here of a posthumous work, which was not completely constructed. The modifications were done during the architect's life, who dedicated almost ten years to the elaboration and adjustments of this project, and he traveled to Baghdad twice. Even Le Corbusier himself had predicted that he would not be in charge of the construction: that it would be supervised by another team, headed by Georges Marc Présenté, who was already working in Iraq. It was not the first time that Le Corbusier designed a project for an Islamic Mediterranean country. His fascination with the Orient (His "Grand Tour" arrived in Istanbul) was well known. Besides, he had already designed a general plan for the city of Argel where he lived in the 1930's.

Upon recommendation from Abdul Rahran Jalheli, former minister and administrator of the Development Board<sup>3</sup>, Le Corbusier was given a commission for a large Olympic size sports complex, in 1955 (according to Chadirji, Le Corbusier was, along with Callicrates and Ictinos, and Michelangelo, the best architect in history<sup>4</sup>). The project was to include different facilities such as a soccer stadium for 50,000 spectators (other sources say 100,000), space for track and field, tennis courts, various pools for 5000 users (among these, one with waves and one with an Olympic trampoline), and a large gym for 3500 athletes, exceeding the recently constructed stadium in Beirut (Lebanon). Le Corbusier requested documentation about different stadiums, among them the project from Francesc Mitjans (and José Soteras) which were being constructed in Barcelona, referred by Joan Prats<sup>5</sup>.

Le Corbusier suggested including the detachable pavilion that the musician Xenakis, who collaborated with Le Corbusier, and also worked on the stadium project in Baghdad, had built for the Universal Exposition of Brussels in 1958, and in whose interior were projected images and where an electronic music composition from Varese was played. Gardens, with different species of native trees, in the middle of an artificially irrigated area, as were already produced in Mesopotamia, and a restaurant, completed the project. This way, the project, which was initially a sports facility, fulfilled different leisure needs, as much athletically as musically and visually. A curved roof, inspired by the Phillips Pavilion, was to cover the stadium. The covering was to be tense and translucent, so that the gymnasium would evoke images of a large camping tent, implanted in an Eden.

Without a doubt, the project was diminishing as the years passed. After the death of King Faisal II the location was changed many times: initially it was to be situated on the right hand bank of the river<sup>6</sup>, just in front of the central station. It

was later changed to the left bank, in a zone that was in a period of expansion. The Phillips Pavilion could not be moved. Different facilities (such as the wave pool) were ruled out. Construction began on only one part of the project (the gymnasium which was the most developed design from Le Corbusier) in 1979 (forteen years after Le Corbusier drowned in the sea), and were headed up by Présenté, who the government had put in charge of the executive project, and which concluded in 1983<sup>7</sup>, already under the rule of Saddam Hussein. The stadium, called Al Sh'ab, was finally constructed by a Portuguese architect F.K.D. Amaral<sup>8</sup> in 1966 (and inaugurated with a match between Iraq and Portugal). After being closed for a year and a half, Al-Shaab Stadium reopened for soccer, in a league game, Saturday, December 1<sup>st</sup>, 2007.

The gymnasium is composed of two parts: a closed block, dark and compact, made of cement, with a curved metallic covering, and a small sports track in full sunlight, with stands on both sides. Various ramps, one of which spirals around a central pylon, give access to the upper part, outside (one terrace) and inside (stands reserved for the press) of the building. The covered part, in a T shape, has adjacent stands on three sides, around the track, while a heavy metallic sliding door closes off the fourth side, which, upon opening, allows the open air playing field to expand the interior area, and becomes a stage adjacent to the covered space.

The presence of ramps, both straight and spiral, has been interpreted as a reference to the architecture of antiquity, (Mesopotamian and Egyptian) and to the beginning of the Islamic world. In particular this refers to the spiral ramp of the minaret of the Samarra Mosque, from the IX Century (whose upper part was damaged in 2005 by the civil war), which is considered to be an adaptation of the straight ramps of the Mesopotamian ziggurats. Regardless, this type of interior and exterior access was already a staple in the projects of Le Corbusier since the 1930s<sup>9</sup>.

For Le Corbusier, the gymnasium was not dedicated only to sporting activities. Rather, it was conceived of for "meetings, opera, orchestras, and basketball"<sup>10</sup>. The building has suffered from the years of war and the current chaotic situation. However, the project, theatrical and not very practical, like the majority of projects from Le Corbusier (the ramps, in full sunlight, are punishing almost year round, as are the outside stands), has kept the complex from being put into full use (though it is well preserved and hosts both infant and youth sports teams).

## Notes

- 1 Le Corbusier Foundation, Paris, inv. number E-2-16-128
- 2 Iraq Museum, Baghdad, inv. number IM55357. The translation of the text of the tablet is not included in the present text because it is incomprehensible if not annotated in detail. The vocabulary included refers to distant realities; the triangle, in Akkadian, was called a nail's head (for its similarity to said object). The reader should refer to the translations and commentaries on this text in, for example: FRIBERG, Jöran: *Amazing Traces of a Babylonian Origin in Greek Mathematics*, World Scientific, Singapore, 2007, pages 97-100; HØYRUP, Jens: *Lengths, Widths, Surfaces. A Portrait of Old Babylonian Algebra and Its Kin*, Springer, New York, 2002, pages 231-234. I would like to thank Jaume Llop (Institute of the Antique Middle East, University of Barcelona) for the location, the inventory number and the bibliography of this piece, as well as Jordi Abadal for the complementary bibliography.
- 3 Le Corbusier Foundation, Paris, document from May 29<sup>th</sup>, 1957, inv. number P4-2-36.
- 4 Letter to a minister, 1963 (Le Corbusier Foundation, Paris, inv. number P4-5-98)
- 5 Letter from Joan Prats to Le Corbusier in the Le Corbusier Foundation, Paris, inv. number P4-1-112(3). Answer to Le Corbusier to Joan Prats, inv. number P4-1-119.
- 6 Le Corbusier requested that the stadium face the river, close to Gio Ponti's building, so that the water could enter the grounds (LE CORBUSIER, "carnet L50", FRANCLIEU, Françoise de (ed.): *Le Corbusier Sketchbooks, vol. 3, 1954-1957*, The Architectural History Foundation and MIT Press, New York and Cambridge, Massachusetts and London, 1982, n. 1072).
- 7 The majority of studies state that the project was developed in between 1973 and 1979. However, the University of Baghdad affirms that works was started at the end, not the beginning, of the 1970's, and they finished in 1983. The total embargo, this time cultural, impedes us from having dependable statistics outside of Iraq.
- 8 I owe this information to Dr Ghada Siliq (Architecture Department, School of Engineering, University of Baghdad). Construction of the stadium had been set, weirdly enough, for 1953 (GANS, Deborah: "Saddam Hussein Gymnasium 1980", *The Le Corbusier Guide*, Princeton Architectural Press, Princeton, 1987, p. 146), and in 1967 (TAJ-ELDIN, Suzanne: "Baghdad: Box of Miracles", *The Architectural Review*, 181, 1079, January 1987, p. 82).
- 9 TAJ-ELDIN, Suzanne, MOOS, Stanislaus von: "Nach Plänen von...Eine Gymnastikhalle von Le Corbusier in Bagdad", *Archithese*, 3, 83, May-June 1983, p. 42. TAJ-ELDIN, Suzanne: *Op. Cit.*, p. 82: the author cites the ramp of the Egyptian temple of Queen Hashepsut.
- 10 LE CORBUSIER, "carnet L50", FRANCLIEU, Françoise de (ed.): *Op. Cit.*,

## THE NORTH AMERICAN EMBASSY IN BAGHDAD (1955-1959)

José Luis Sert

The North American government chose José Luis Sert, Dean of the Harvard Graduate School of Design, to design the embassy