



Urban materiality



Extreme high quality



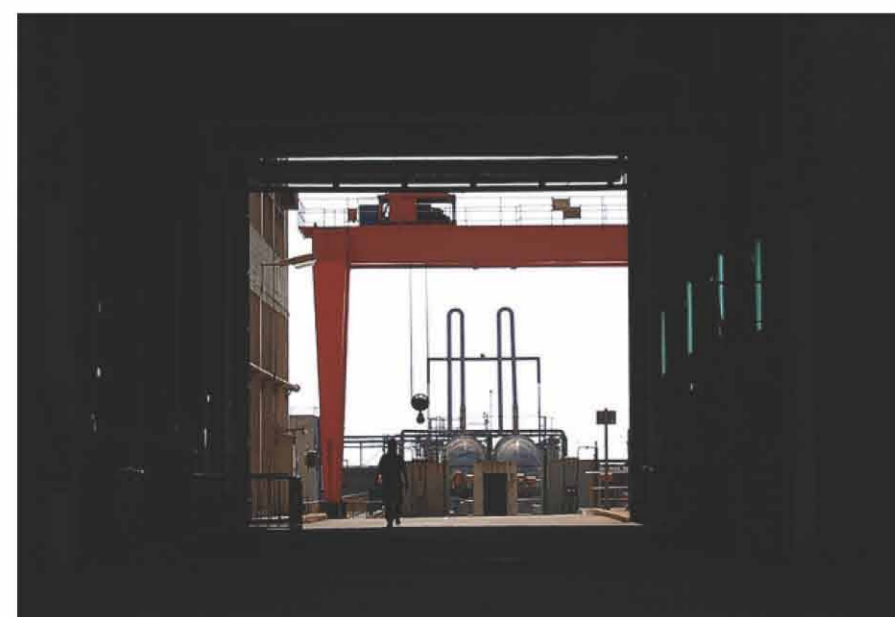
Machinery presence



Enormous dominant crane



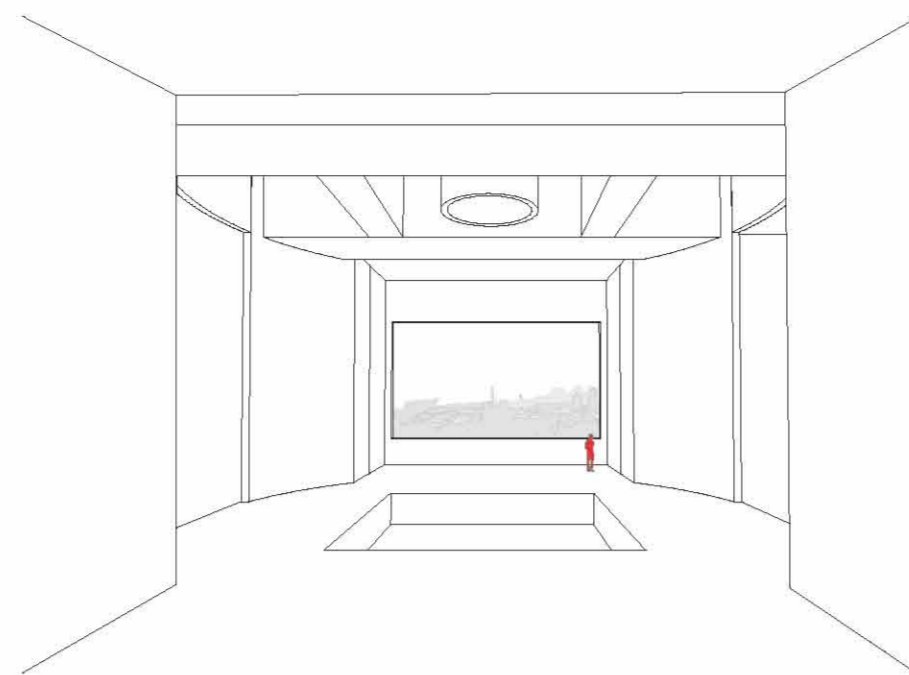
All important things in life are done through holes



Mysterious deep body

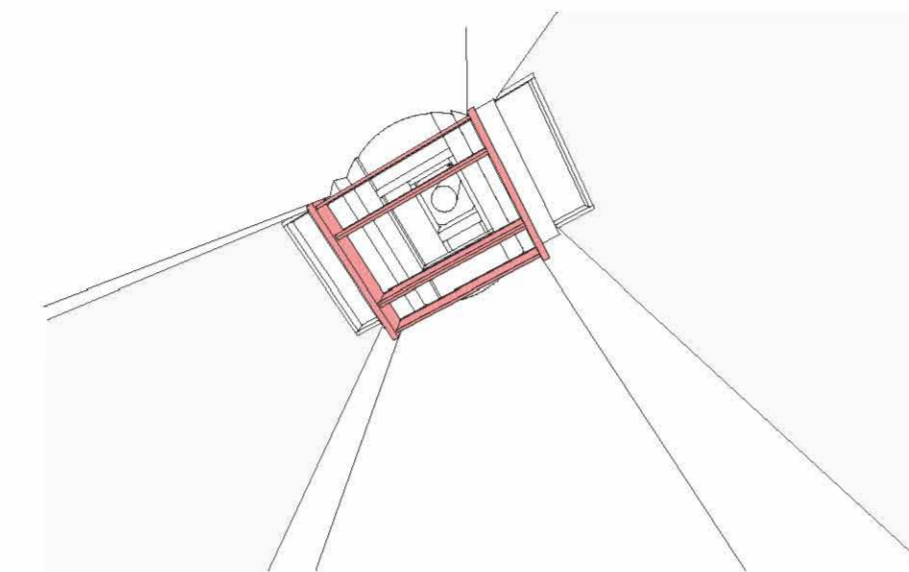
On the top of the tower a space of enormous dimensions is clearly defined by a radical symmetry. There is an interesting tension between the strict enclosed space and the openness of such oversized perforations. Its four big holes are orientated in two different directions. The horizontal axis is defined by the huge openings which were used to introduce large amounts of air for the combustion. On the other hand, the vertical axis drives the views either down to the street or up to the sky.

**Top tower**



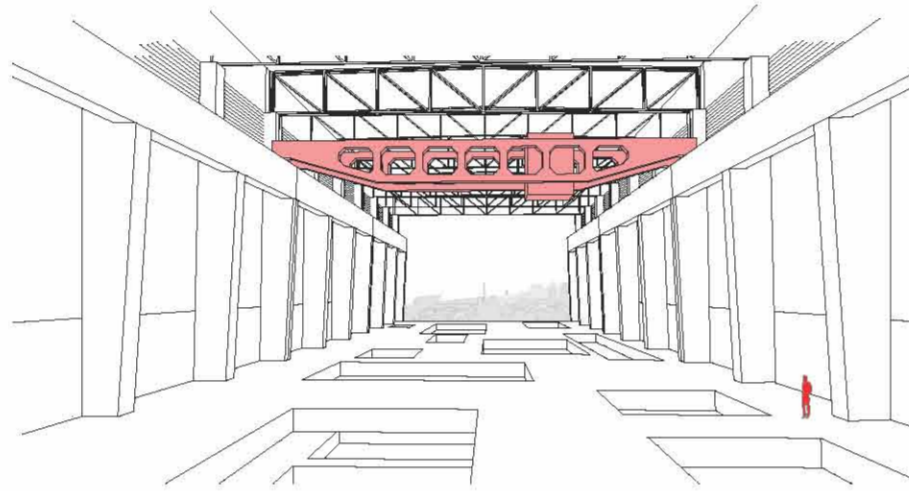
The tower volume is a very high space, whose verticality is defined by the two concrete arms. In fact the presence of the concrete mass is powerful enough to enclose a clear space. Thanks to its proportions and together with its smooth curved walls it becomes an elegant and refined space. One can see the horizontal strips of the concrete layers poured at different building phases. It is ruled by an enormous though simple beam system from which the machinery used to hang.

**Tower**



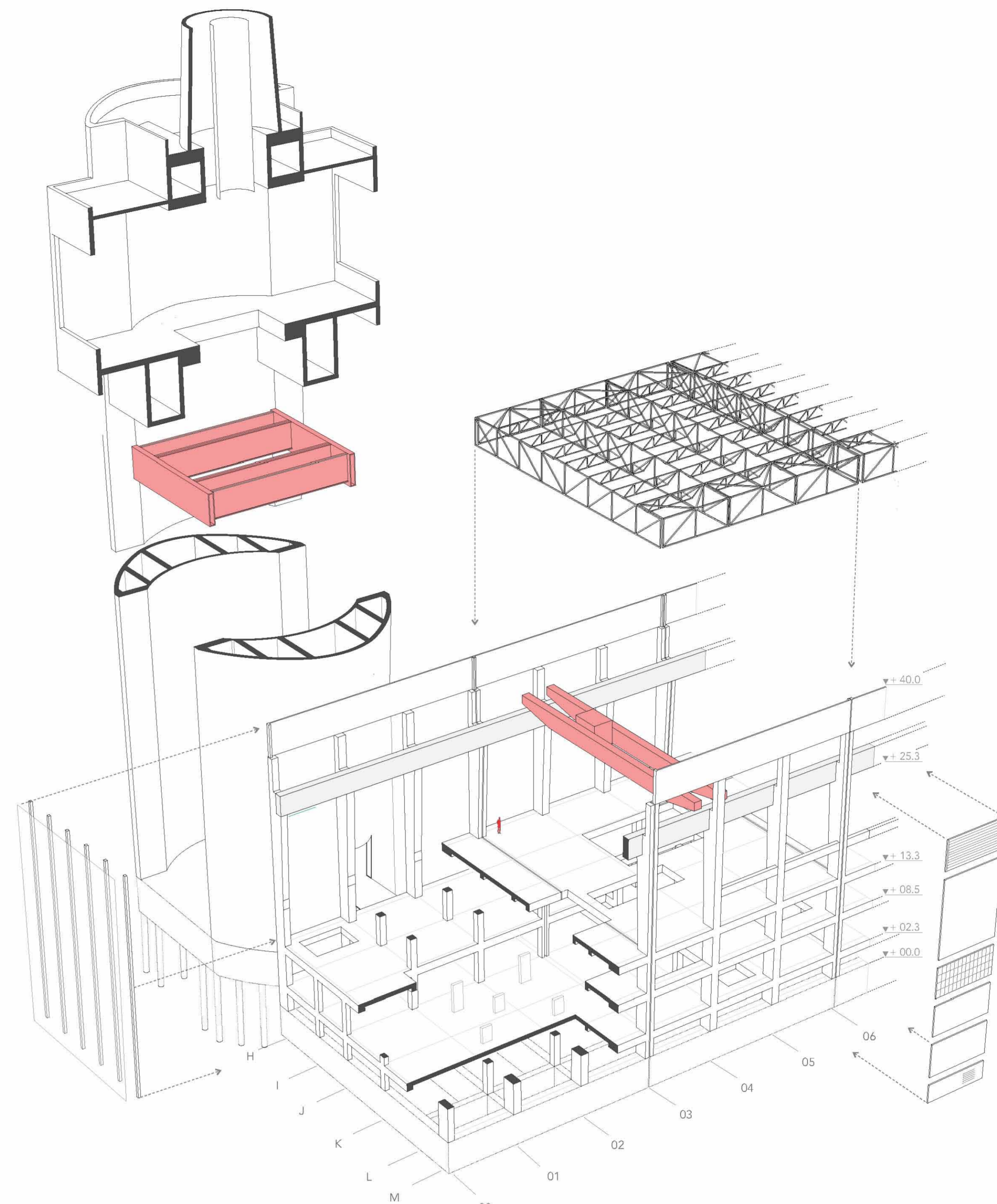
The turbine hall is a large dimension space with a clear direction and a repeated structural rhythm where the crane is the main protagonist. It is covered with an equipped light beam roof that seems to float thanks to the strip light entering from the top of the walls. The light is the key of the space's magical appearance; it reinforces the rhythm of the portico and at the same time brings a sacred feeling. The strong orientation of the nave is ended by a big opening on the south which is directly overlooking Barcelona's downtown.

**Turbine hall**



A chaotic space takes place in the framework that was previously occupied by the machinery. It now offers a fragmented space without an evident order punctured through multiple places and offering through these holes, many visualization possibilities. It becomes as such, the space with a more human scale. Due to its wideness light can only reach the middle part through the holes converting them into the main protagonists of the space.

**Turbine holes**



There is the same building repeated exactly 3 times, and each of them counts with two main structural entities. Due to its especial condition as military target it was designed to resist much more than standard constructions.

The tower is based on two concrete screens stabilized at the top by a crossed beam system. The loads are brought to the ground through a huge concrete slab together with 30 meter long piles.

The nave is based on a portico structure with a 9 meters rhythm and with structural joints every 27 meters (3 modules). Floors and roof are connected to a 40 meters high column with a 2x1 meters section. The lower floors are used to stabilize the portico together with the beam that holds the crane. The facade elements are just light infill's placed in the gaps defined by the concrete skeleton. There are also other structural elements that were used to hold the machinery, like the turbine pillars, which can still be useful.

**3 in 1**

The plant was made up of three electricity-producing blocks of 350MW each one. The first one started to work in 1973, the second one in 1974 and the third one in 1976. Each block is made up of an oval-shaped building, measuring 40m along the smaller axis and 90m high. Inside this building, we find the vapour generator and over it the 200m high chimney. The three turbo groups are placed in the turbine building which measures 178m long by 36m high.

