

For the conceptual idea it was proposed that it be a simple and natural element of the site, for that reason the water of the rivers was considered as the main design of the form



The geometric shape of the confluence point is considered as a modular element for the layout of the floor, as well as the configuration of the bridge as a connection between the two sides of the river.
And the existing curvatures as geometric elements for the sculpture that is projected.

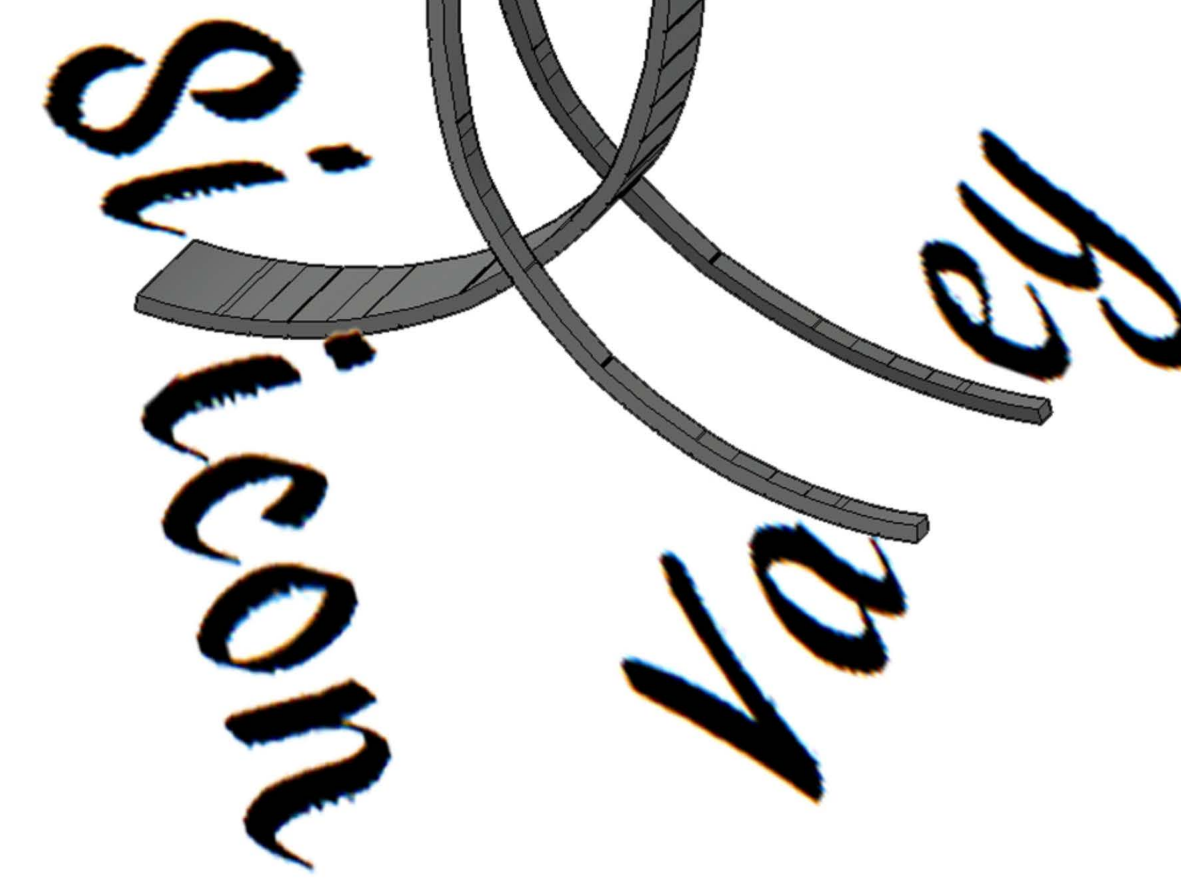
Water

For the use of water, a pump room was proposed, which is fed by the northern pond, for the following functions:

1. Water that runs through the centers of each of the branches of the lower part of the sculpture, and that runs from the center of the sculpture to the southern part of the property formed by the two rivers.
2. Water to irrigate vegetation on the sides of the sculpture.
3. Water for cleaning the sculpture, middle and upper part.

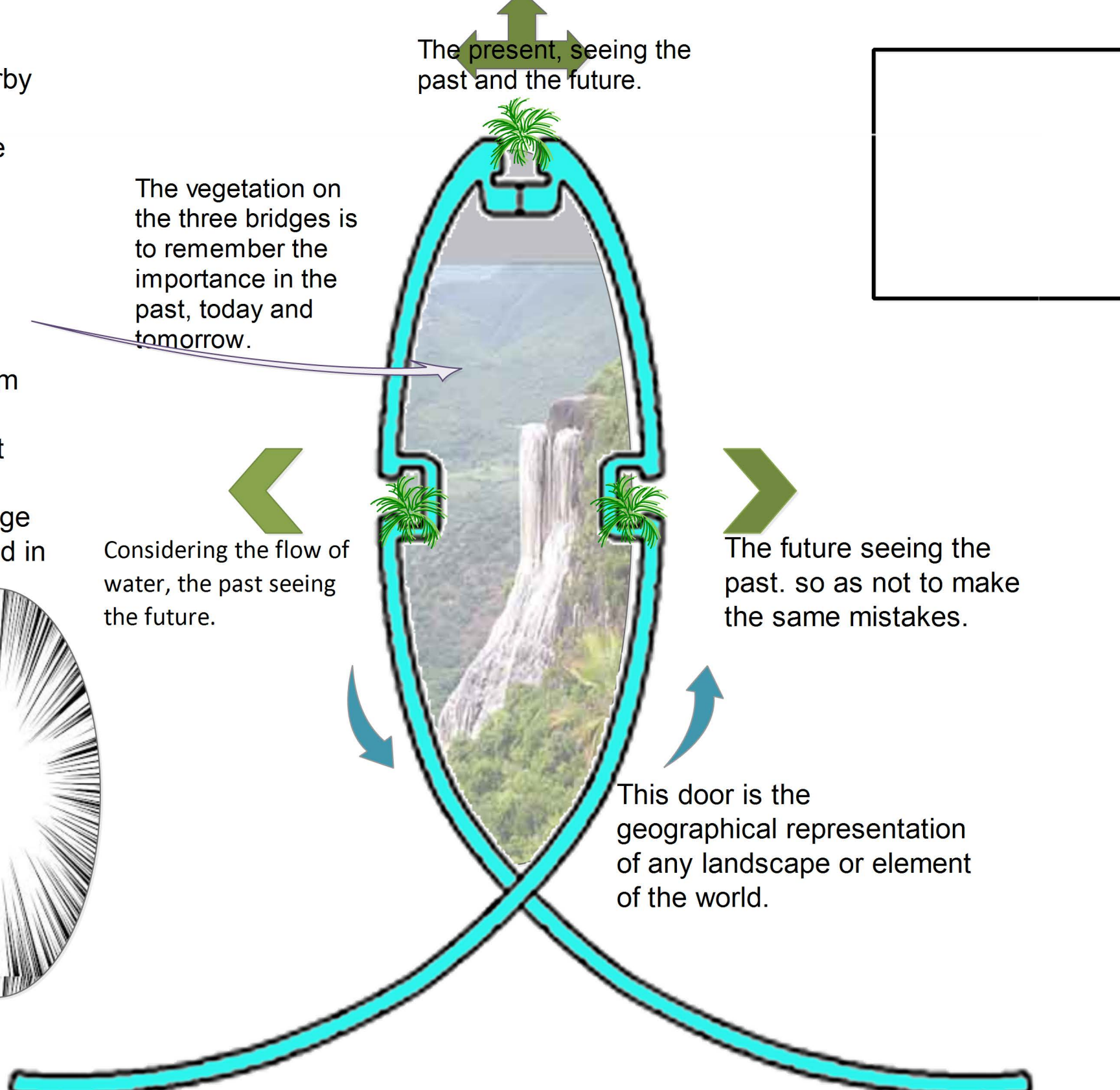


The design as part of the city.



In order not to affect the nearby environment or aviation problems, two techniques are proposed for lighting:

1. Lighting is directed to the center of the sculpture. Achieving a focal point of lighting.
2. Illumination by 3D hologram images. They can be any landscape, object, and adjust the shades of light you want. laser projectors with long-range lenses strategically distributed in the sculpture.

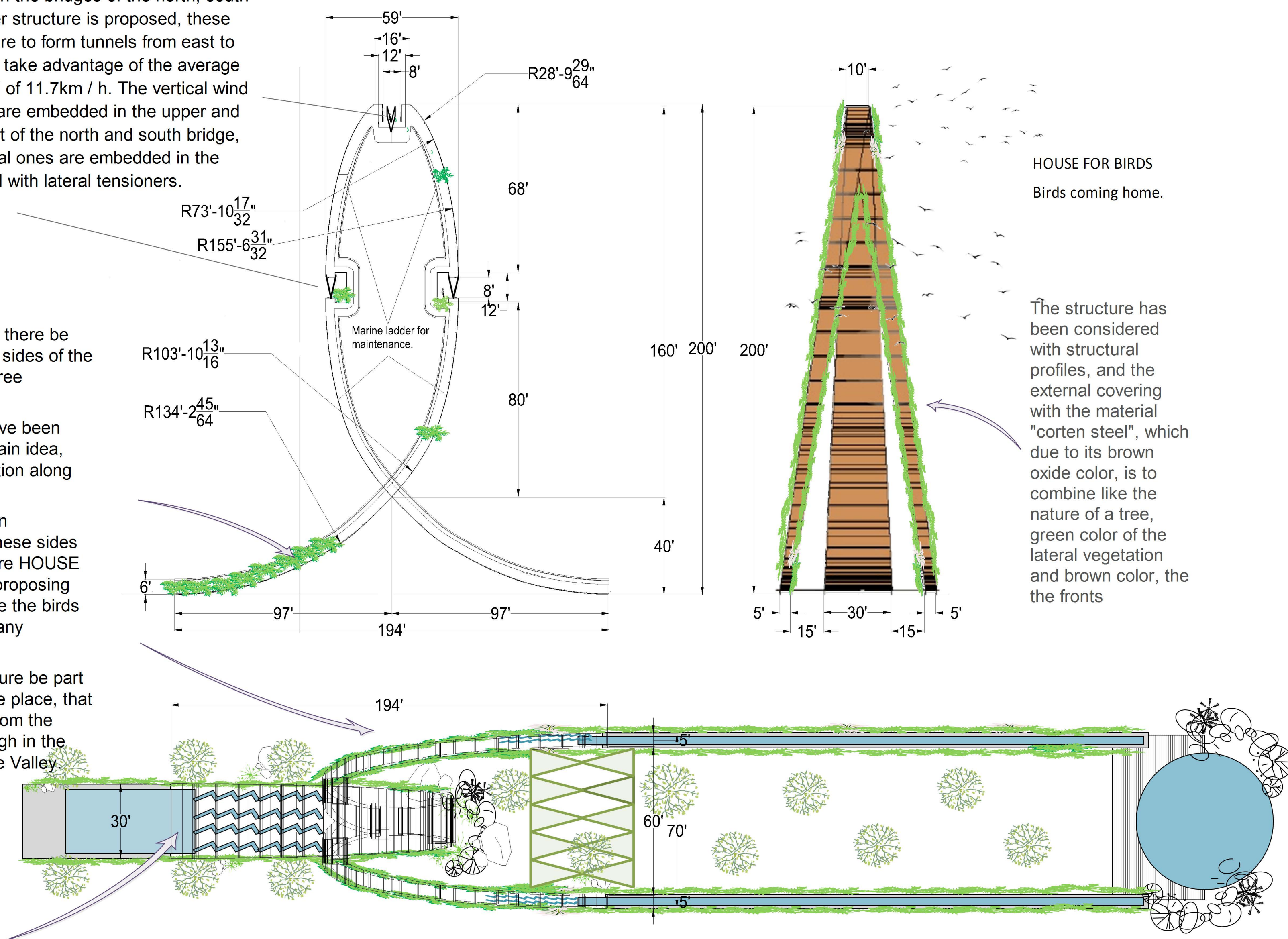


The design is the confluence of the two rivers, which rise and form the gateway to Silicon Valley.
This seed-shaped door, is representing this seedbed of opportunities that exists in Silicon Valley, with its roots that are born from the earth, and that allows to protect the existing landscape in the middle of urban expansion.
It has three bridges that represents the past, present and future.

The placement of vertical wind turbines in the bridges of the north, south and upper structure is proposed, these bridges are to form tunnels from east to west and take advantage of the average air speed of 11.7km / h. The vertical wind turbines are embedded in the upper and lower part of the north and south bridge, the central ones are embedded in the floor fixed with lateral tensioners.

The proposal that there be vegetation on the sides of the sculpture is for three reasons:

1. Since rivers have been considered the main idea, they have vegetation along their banks.
2. It has also been considered that these sides of the sculpture are HOUSE FOR BIRDS, by proposing perforations where the birds can nest without any problem.
3. That the sculpture be part of the earth, of the place, that is why it is born from the earth and rises high in the sky of the Silicone Valley



The first aspect to start and propose zero energy was the shape coefficient, it is considered that the spherical shapes have the best shape coefficient (and therefore are the ones with the least energy losses). Igloos in cold climates and vaults in hot climates.

It was sought that the shape of the sculpture is that they were slats forming an intermediate hollow with curved shapes, so that the temperature was self-regulating, and taking advantage of the west wind.

The proposal as a hollow element is that the support elements (slats) are illuminated during the day by the interior and exterior, giving different shades. And at night using minimal energy due to the proposal of placing 3D projectors indoors, which serve to illuminate the site in a spectacular way and without affecting the environment by light, thus reducing unnecessary light fixtures.

The use of steel profiles for the structure is proposed, since it can be recycled material that is used for sculpture, and take advantage again to recycle all waste. For the skin it has been considered a material for mule maintenance and attacks with graffiti.



In the design phase prior to decision-making, the energetic behavior that the sculpture can have throughout its life cycle was considered. To carry out this, the following aspects were taken into account:

- Location, temperature and comfort bands.
- Solar radiation and number of sunny days.
- Prevailing winds.
- Humidity and rainfall.

For this data, the information on the page was considered: <https://es.weatherspark.com/y/557/Clima-promedio-en-San-Francisco-California-Estados-Unidos-durante-todo-el-a%C3%B1o#Sections-Wind>, and the following zero energy concepts are proposed.

The placement of vertical wind turbines in the bridges of the north, south and upper structure is proposed, these bridges are to form tunnels from east to west and take advantage of the average air speed of 11.7km / h. The vertical wind turbines are embedded in the upper and lower part of the north and south bridge, the central ones are embedded in the floor fixed with lateral tensioners.

Taking into consideration that the perceived humidity level in San Francisco, measured by the percentage of time in which the humidity comfort level is sultry, oppressive or unbearable, does not vary considerably throughout the year, and remains practically constant at 0%. It has been proposed that the two channels on the south side circulate water through the lateral channels in order to achieve a comfortable degree of humidity, as well as the water mirror on the south side, with the same function; water begins to flow from the midpoint of the structure, which is where they cross from north to south. The function is that the heat that accumulates in the structure is absorbed by the water, managing to cool the lower part of the sculpture, and in this way does not radiate heat to the visitor.



Aerial view.
Night view with Holograms.
View sculpture receiving from the entrance to the park.
View from the boulevard.

