

POLYTECHNIC OF TORINO
FACULTY OF ARCHITECTURE
Degree in Architecture
Honors theses

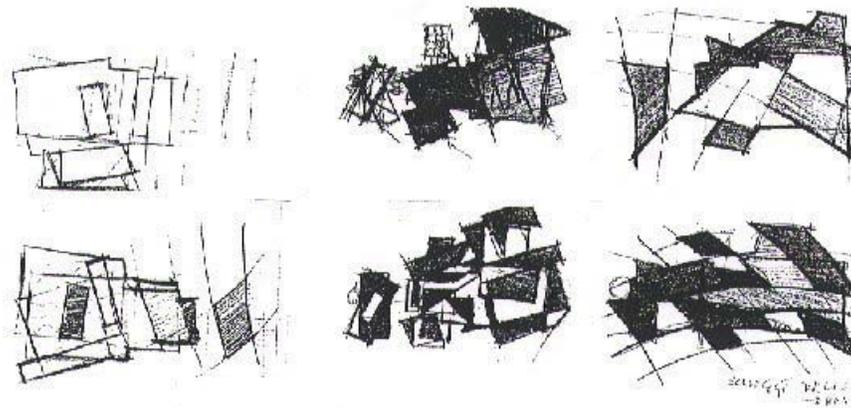
Project of a Waste incineration Plant in Gerbido locality, Turin, Italy

by Massimiliano Vurro

Tutor: Giacomo Donato

Co-tutor: Evasio Lavagno

The flight of about a thousand gulls, herons and draskes on the 8 thousand square metres of the Turin' s waste dump .This immense expanse will turn a public garden in the year 2003.



The model and a studying plan sketch

From then it will become necessary to find alternatives.
In Italy more than 90 % of rubbish is still thrown in stinking dumps!
This is unacceptable just because it involves big expenses of high habitation's density soils.

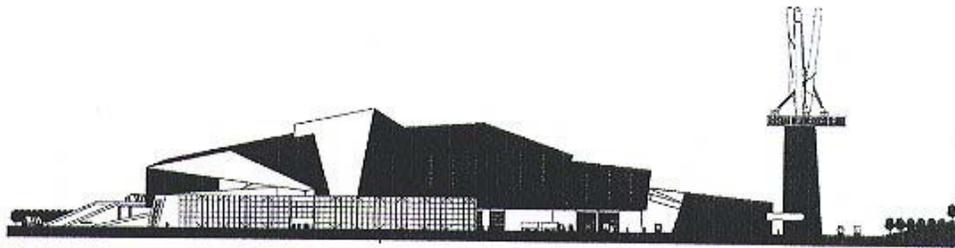
The environmental policy should direct toward a re-use and recycling of the packaging where possible and toward the waste incineration plants using the refuse burning power to produce enough electricity to supply a middle sized provincial city. In Italy the waste management has become a subject of great topical interest because of the inefficiency and the facts of rake-off.

This Degree thesis try to build a relationship between industrial and architectural culture, and it means first of all to find new some different forms from today's trade régime between policy and consent.

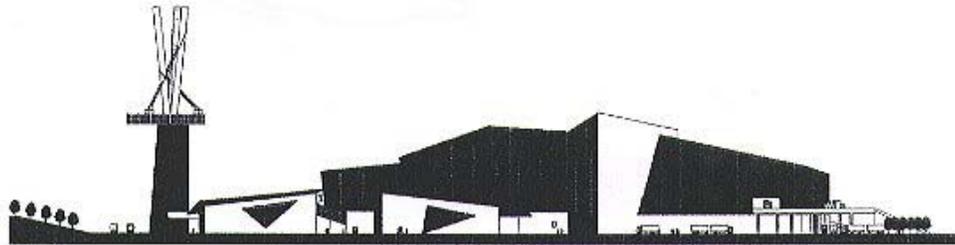
The plant is built in the south-west sector of Turin bordering upon Orbassano, Grugliasco and Beinasco, near the Orbassano railway yard and the cemetery. The Turin town planning confirms the urban compatibility of the site because it has been designed to technological plants. During the planning- work I had to choose if to rid myself from every contacts with the reality ; but it was not possible because this could be only a plain subjective projection; or if on the contrary, to take objectively sides about the reality changing hypothesis.

The combustion of matter creates energy and produces some other matter (in this particular case slags), this simple process, in which water, air, fire and soil are the protagonists ; has been the starting point of all my thesis work which i prefer to call " Splinters from Earth "

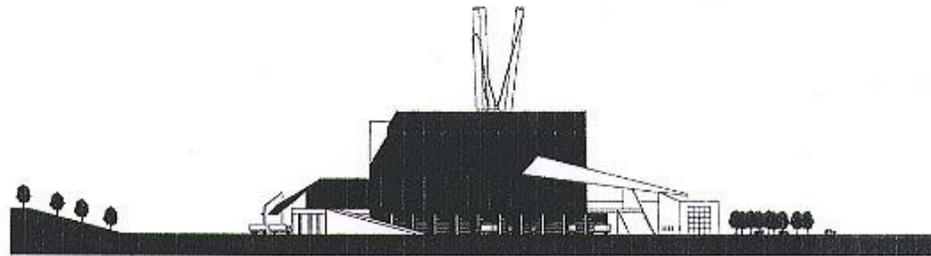
The research about the systems has been the main way to understand and to "know round what to put a skin " .



PROSPETTO SUD



PROSPETTO OVEST



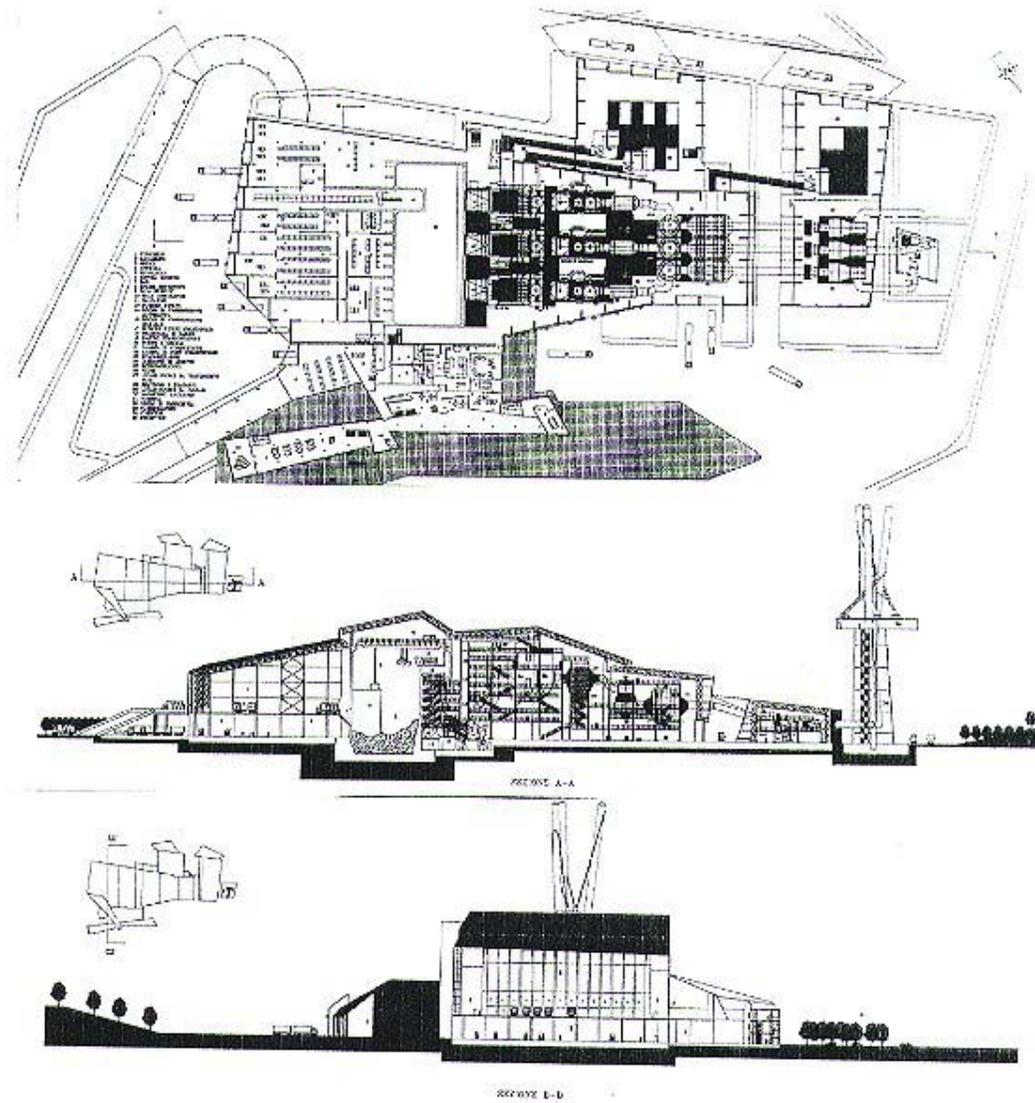
PROSPETTO EST

Elevations

The building is made up of four main materials:

- reinforced concrete for the carrying structures, the refuse bunker, and for the two soundproofing walls in the slags zone.
- steel for the plants support structure , for the reticulate one, for the tie-beam system of the smoke -staks.
- aluminium for the building skin, for the pillars' skin working on the glass wall in the offices zone
- glass for the main elevation of the offices building.

The research on a not only practical cohesion (It is often the only one bond respected for this kind of buildings) but even formal between different sectors, the dimensioning balance, the materials and the colors have been all additional parameters to the systems planning.



First level plan and sections

The project has to be read in an overall way, just like a complex organism developed thanks to the dimensioning inputs of every single system hidden under the skin of an enormous heron looking for food on a soil destined to become a railway park, never built.

For further information, Massimiliano Vurro, e-mail: arkadimax@libero.it