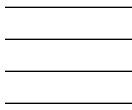




BI[r]O-BO[o]T

Ecosophical Apparatus & Skizoid Machines



Francois Roche
Stephanie Lavaux
Benoit Durandin
Stephan Henrich

R&Sie(n)+Ds

"...in power games, [apparatuses could be considered] relationship strategies supporting types of knowledge and supported by themselves."

MICHEL FOUCAULT, DITS ET ECRITS

Machines are always pretending to do more than what they were programmed to do. It's their nature.

Their behavior alternates phantasms, frustrations and fears inspired by their own ability to break free and threaten us.¹

The blurriness between what they are supposed to do, as perfect alienated and domesticated creatures, and the anthropomorphic psychology we intentionally project on them, creates a spectrum of potentiality, both interpretative and productive, which is able to re-“scenarize” the operating processes of the architectural field. Machines are a vector of narration, generators of rumor, and at the same time directly operational, with an accurate efficiency of production.

These multiple disorders, this kind of schizophrenia, could be considered a tool for re-opening processes and subjectivities, for re-“protocolizing” indeterminacy and uncertainties. In this way, they become agents of blur logic, of reactive and re-programmable logic.

As in *Alice in Wonderland*, where Lewis Carroll used mathematics to confuse a little girl's perception, such apparatuses, including “bachelor machines,”² stretch a line of subjectivization to organize *repetitions and anomalies*³ using and developing paradoxes that are able to re-complexify and de-alienate the edges of the truth system, in order to re-invert the *logic of meaning* and turn it into a vanishing point...

It seems to make strategic sense to evaluate architecture's degree of reality on the basis of its ability to tell stories and in this way enlarge the dimension of its physicality. In a sense, we should consider the structure itself as a fragment of a scenario, a MacGuffin, the point where and from which speeches, strategies, scientific protocols and power games articulate stories and agendas.

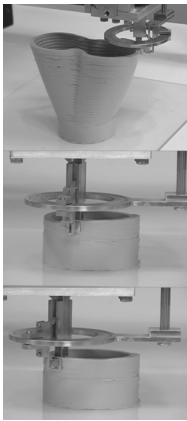
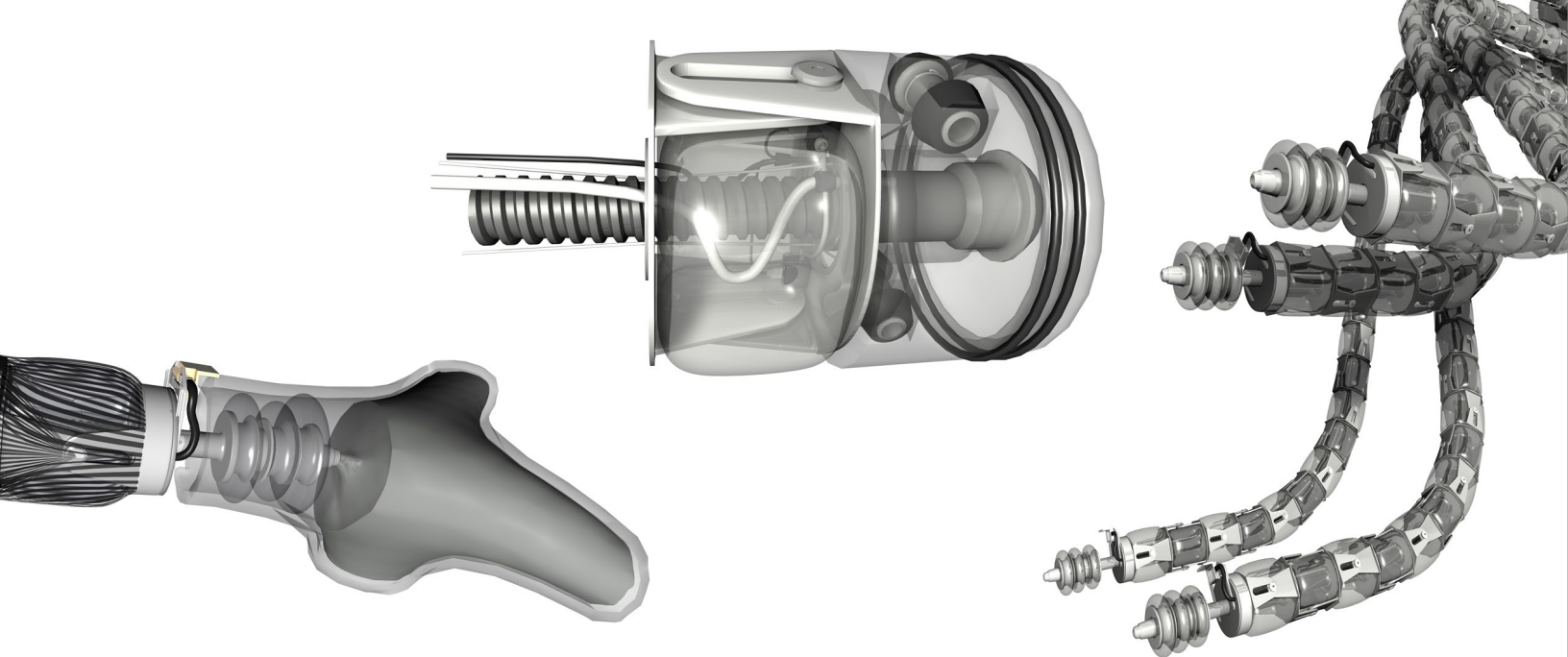
Misunderstandings, in this sense, produce artifacts—in “the garden which forks nowhere”—and apparatuses can be considered generators of ambiguities and knowledge where non-shaping protocols, protocols of emergence, contingently reveal the conditions of emission and are revealed by them, in a Situationist⁴ strategy.

The six BI[r]O-BO[o]Ts should be considered a preliminary spectrum, from a speculative self-organized urbanism (*Iveheardabout*) to a digestive physiological experiment (*thegardenofearthlydelights*). Within these endpoints are a stochastic machine with a predictable uncompletion (*Olzweg*), an industrial milling machine for anthroposophic transactions (*waterflux*), a standing up machine, as a Darwinism evolution from a André Bloc house to its extension (*broomwitch*) and at last but not least, a pure chimera hybrid bio-robot—the mechanical ghost of a wild forest where cold war degrades nature (*heshotmedown*).

Their skyzoid-machinism agendas are both products and vectors of paranoia⁵.

Endnotes

1. As the Golem did to its own creator, the Rabbi Loeb.
2. In the sense of Marcel Duchamp & Picabia.
3. In the sense of *Difference and Repetition*, G. Deleuze, 1968.
4. *La société du spectacle*, Guy Debord 1967 / Declaration d'Amsterdam, Constant and Guy Debord, 1958.
5. In both senses, “critical paranoia” and pathological paranoia.



1 I've heard about

Urban experiment of a flat, fat growing processes and entropic indeterminism.

1.1 SCENARIO

- Speculate a habitable organism that develops by means of adaptive, transitory scenarios in which the operational mode is uncertainty.
- Write growth scripts, open algorithms, that remain permeable not only to human expressions, but also to the most discrete data such as the chemical emissions (by re-reading the concentration of cortisol) of those who inhabit it.
- Make this software an open source one, to be modified and infiltrated by its entropic development.
- Contractualize and operate a contour crafting building machine (the Viab) able to pour fiber reinforced concrete and make actual in real time the ever changing interaction between the inhabitants and their environment.

1.2 DETAILS

- MAM-Paris, MOT-Tokyo, Contemporary Art Museum & Le Laboratoire, Art and Science Gallery, Paris, 2006–09
- Architect: R&Sie(n)... Paris
- Creative team: François Roche, Stephanie Lavaux, Jean Navarro, Benoit Durandin
- Machine with Stephan Henrich, architect
- Key dimensions: exhibition-research on 600 m2
- Client: Contemporary Art Museum
- Cost: 0.3 m usd

FIGURES 1 AND 2. IVEHEARABOUT—DETAILS OF CONCRETE SECRETION ROBOT (LEGS AND NOZZLE).



2 Water Flux

Design of a building for an art museum/alpine ice research station

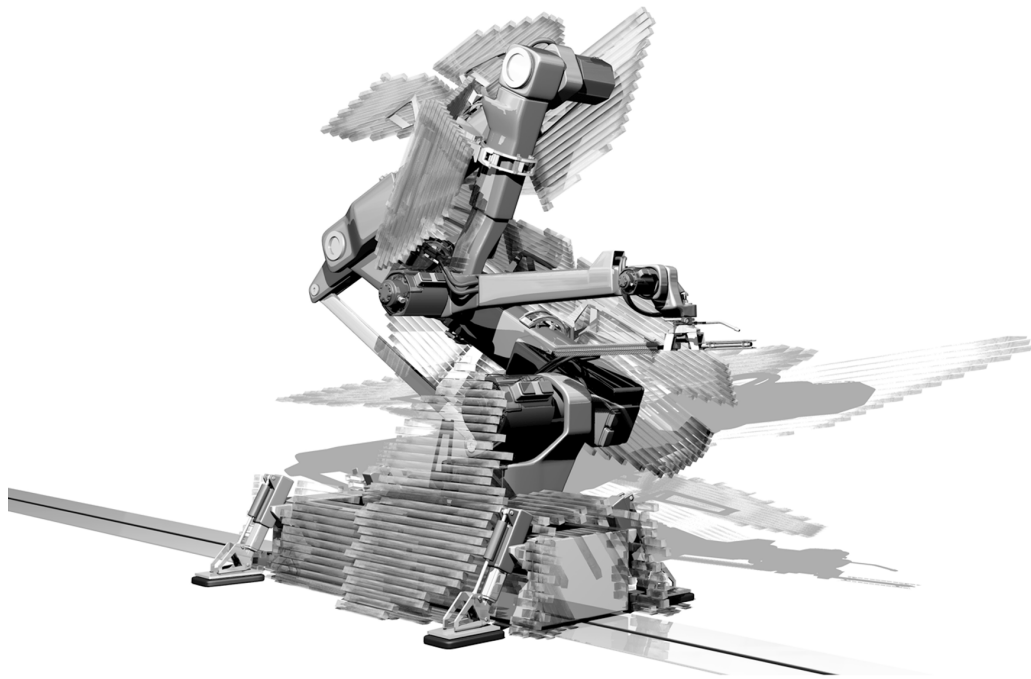
2.1 SCENARIO

- Digitization of the envelope of a traditional habitat.
- Scooping out hollows within this volume as if it were an ice cavity, but in full wood by a 5 axes drill machine.
- Water states and flows vary according to the seasons: The ice flows and freezes; the ice façades freeze and melt, forming a pond in front of the building.
- Exacerbation of the winter climate by artificial snow (500 m3)
- Construction by CNC machine processing, 5 axes, in full wood (2000m3-1000 trees) and reassembling the manufactured 180 pieces on site.
- Reactivation of local economy

2.2 DETAILS

- Évölène, Suisse (Scrambled Flat 2.0)
- Architect: R&Sie(n)... Paris
- Creative team: François Roche, Stéphanie Lavaux, Jean Navarro
- Engineer: Guscetti & Tournier, Geneva
- Interior Design: R&Sie(n) + Mathieu Lehanneur (museum apparatus)
- Museum design experiments: Mathieu Lehanneur
- Key dimensions: 1,000 m2
- Client: Maison des Alpes, Public Foundation
- Cost: 13 million FS

FIGURE 3. WATERFLUX—PROTOTYPING SCALE 1



3 Olzweg

Design of a Museum for Experimental Architecture

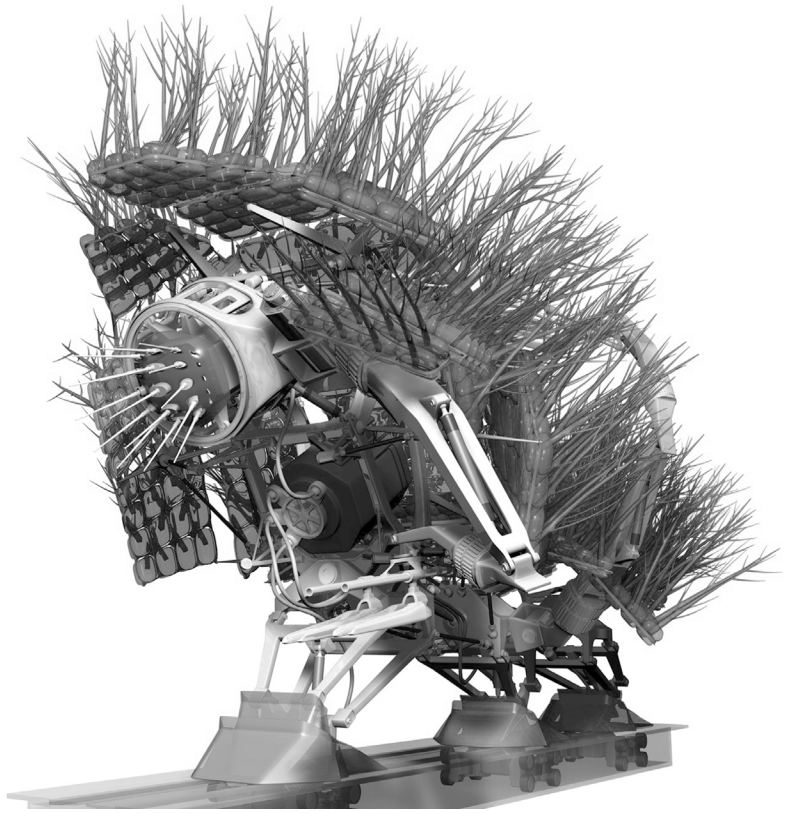
3.1 SCENARIO

- The courtyard of Frac is smeared and aggregated with glass stick in order to generate a gluing, a smearing of the existing building as a potential of a Body Without Organ (a “going to be done” and unachieved process of construction) and inside the thickness of the glass a labyrinth walk way and accessibilities. A scattering script is written to develop the aggregation.
- Procedures of constructions and cleanings are assisted by robots (with or without automatism) to introduce randomization and uncertainty in the final shape and to be able to re-program the labyrinth during the construction itself...
- The elements of glass are from a citizen glass recycling process in order to reduce the raw material costs and involve the inhabitants of the agglomeration in the “work to be done” story.
- The construction schedule is planned for more than 10 years for the same reason... construction became a factor of desire with a desirable machine (Duchamp)
- Using individual RIFD-PAD to force each visitor to accept to loose themselves in the glass maze and redefine their XYZ positioning according to the specificities of an exhibition (PAD with sound, video and local GPS)

3.2 DETAILS

- Paris, 2006, France
- Architect: R&Sie(n)... Paris
- Creative team: François Roche, Stephanie Lavaux, Jean Navarro,
- With partners:
 Pierre Huyghe, Artist
 Mathieu Lehanneur, Furniture Designer
 Stephan Henrich, Robotic Designer
 Nicholas Green, Facade Engineer
 Sibat, Basic Engineer
 Julien Blervaque, Script Programmer
 & Alexander Römer, Agnes Vidal, Daniel Fernández Florez
- Key dimensions: 5000 m2
- Client: Frac Orléans / Région Centre
- Situation: Orléans
- Cost: 5 M€

FIGURE 4. OLZWEG—STOCHASTIC MACHINE



4 Heshotmedown

Design of a multi purpose house, including private house, dancing center, shop, restaurant, children's museum...

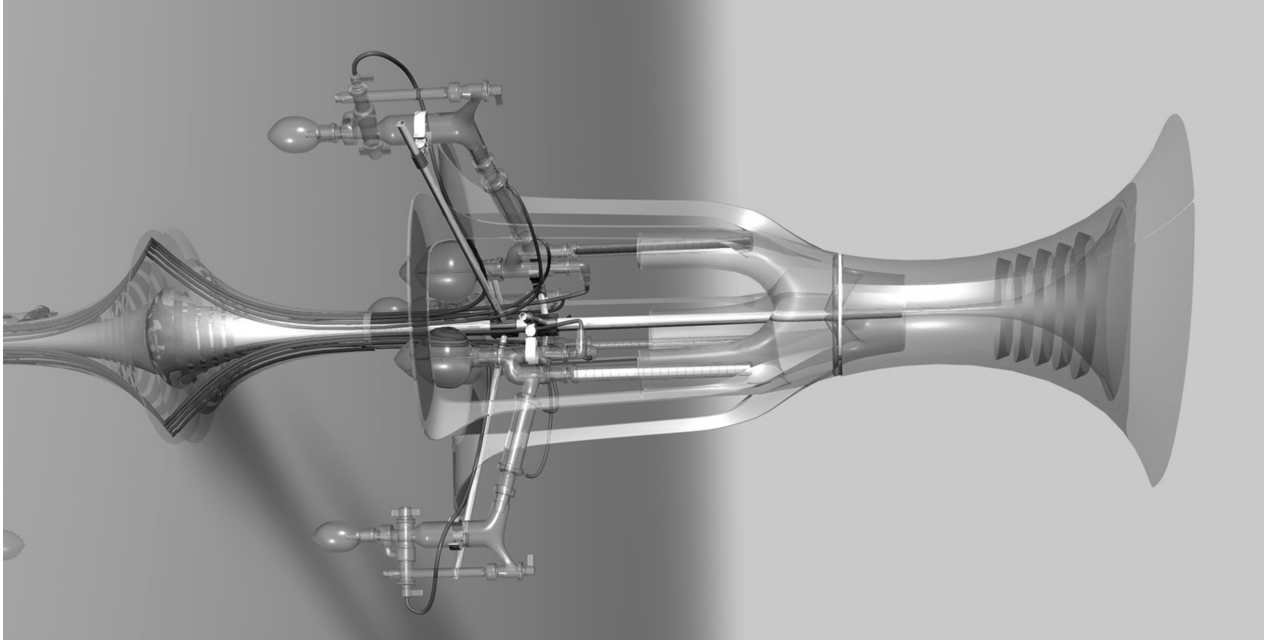
4.1 SCENARIO

- Recognition of the situation / on the north of South Korea, on the DMZ zone, where the danger is weaved with the paranoia of danger and its own Theatralisation
- Recognition of the specificities of the urbanism of Heyri, where domesticity are fully embedded in the public area, where the client becomes the support of public services.
- "Erotisation" of the paranoia, by sweet ballistic impacts in the extended volume of the mountain absorbing the program
- Trajectories of shooting as walk way, porosity access and light providers
- Development of a robot, running (on specific track) in the forest to bring back the biomass on its back, smearing the bio-grass and bio-leaves in decomposition on all external surfaces to maintain the insulation of the building.

4.2 DETAILS

- Heyri, 2006–07, Korea
- Architect: R&Sie(n)... Paris
- Creative team: François Roche, Stephanie Lavaux, Jean Navarro
- Machine with Stephan Henrich, architect
- Key dimensions: 2000 m2
- Client: Miss Julieta and Mister Lee / Seoul
- Situation: Heyri / Korea / South Korea just in front of the North part, touching the DMZ and JSA (demilitarized Zone and Joint Security Area Zone)
- Cost: 3 m usd

FIGURE 5. HESHOTMEDOWN—A CHIMERA ROBOT.



5 thegardensofearthlydelights

Design of a greenhouse for alchemist experiments from toxic plants

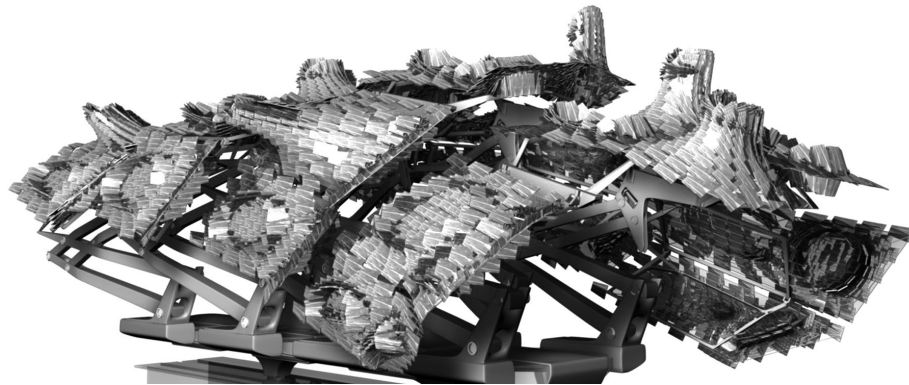
5.1 SCENARIO

- Collecting the casual plants for medical, poison and antidote uses from the middle age period in this Mediterranean situation (Franciscan monastery gardens)
- Emission of a toxic lava, as a top down existing terraced morphology with a process of liquid-viscosity effect to define the new greenhouse.
- Introducing three resistant strength in this dipping down to define the there restricted area for cultivating toxic garden.
- Watering the building by multitudes of porosity of the ETFE inflatable floating cushion
- Introducing nasty spikes for supporting this fragile roof
- Distillating-Sublimating-Drying-Extracting Machine and alchemist preparation for the metamorphosis of the plants in juices, ointments and infusions.
- Testing the "Fugu" effects of each plants on metabolism, by acquiescent visitors (on specific masochism protocols)

5.2 DETAILS

- Lopud, Croatia, 2008
- Architect: R&Sie(n)... Paris
- Creative team: François Roche, Stéphanie Lavaux with Barbara Ozimec, Botanist
- Machine with Stephan Henrich, architect
- Collaborator: Leopold Lambert, Jakob Ingemansson
- Key dimensions: 800 m2
- Client: Francesca Von Habsburg, TBA21 Vienna
- Cost: confidential

FIGURE 6. THEGARDENOFEARTHYDELIGHTS DISTILLING-SUBLIMATING-DRYING-EXTRACTING DEVICES.



6 broomwitch

Design of an extension of an André Bloc house, as a domestic museum (paintings + *cabinet de curiosité*)

6.1 SCENARIO

- Parasite in the garden creating stimuli of entropic revenge of the nature
- Hydroponic tentacles
- Perforating glass in the eyes of the turbulence vortex
- Domesticating and quieting the violence and smoothing gradually the whiteness of the interior for paintings substitution
- Design of a transportation machine from sitting down to standing up as a shortcut of human evolution

6.2 DETAILS

- Meudon, France, 2008
- Architect: R&Sie(n)... Paris
- Creative team: François Roche, Stéphanie Lavaux, Toshikatsu Kiuchi + Pierre Huyghe + Marc Fornes
- Machine with Stephan Henrich, architect
- Key dimensions: 400 m2
- Client: Galerie Seroussi, Paris
- Cost: 1 m€

FIGURE 7. BROOMWITCH—TRANSPORT AND STANDING UP MACHINE