

# Developing a new science museum under extreme conditions: an experience from Brazil

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Campinas – SP – Brazil

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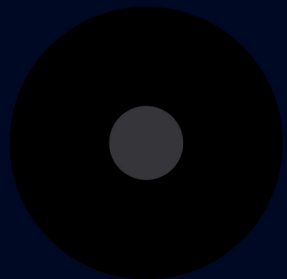


# Matching the local necessities

- Example of Brazil:
  - Most of the museum public is scholar: matching with school contents, teacher's formation, strong presence of mediators.
  - Low income audience: Free entrance, help with transportation, snacks.
  - Reduced mobility of school groups: outreach programs.
  - There is a lack of a sort of “Museum Culture”.

# Science Museum - UNICAMP

- Started formally in 2004.
- Very small museum. Only 4 employees, and 4 faculty members. Around 30 students (facilitators) to help.
- Strategy: start with “small” projects, to form a team, learn how to operate the institution and consolidate the structure.
- NanoAventura, Oficina Desafio, Time and Space permanent exhibition





# Timeline

- **2002-2003:** A small group of faculty members started to discuss the possible creation of a Science Museum
- **2003:** Organization of a small international workshop on the development of science centers. Workshop with David Ellis to develop a strategic plan.
- **2004:** Decision to start with a challenging exhibit on nanoscience and nanotechnology. Meetings to establish goals and conceptual project.

# Timeline

- **November 2004:** Funding approved from FAPESP and Vitae foundation. (around US\$ 650,000). .. **WITH SOME CONDITIONS!**
- **December 2004:** Establishment of partnerships with Campinas municipality, National Synchrotron Light Source (LNLS), Instituto Sangari. Hiring the team!
- **January-March 2005:** Development of the project, front-end evaluation, building and testing the exhibit.
- **April 2005:** Opening during the 5<sup>th</sup> SCWC (Rio de Janeiro)!!!

# NanoAventura: Challenges

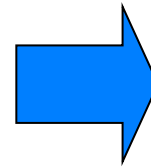
- Funding sources: Vitae (private) and FAPESP (São Paulo State).
- Around **US\$ 650,000.00** for developing, building and operation (one year).
- Opened during an international event in RJ, with hundreds of professionals from the field.
- Work developed together with scientist and engineers.
- Team without ANY previous experience on science centers and/or itinerant exhibitions.
- Different **models** were tried to reach a self-sustained operation: park, travelling (fairs, shopping malls, etc...). More than 50,000 participants.
- Nowadays it is working in the University campus only under group scheduling. Financial support by Pfizer to bring state scholars (bus+tickets). Financial support from the University that pays the facilitators.

# NanoAventura (NanoAdventure)

## How to face an emerging science and technology ?

Lack of sense for the audience

Not present at scholar curricula



Novel challenges in building the social imaginary

Link with scholar contents



How to show a science and a technology of objects with dimensions far from the human perception?

- Emphasis in scale
- Visual emphasis
- Attractive environment
- Proper language for the target public

# Talks, conferences, round tables



# Prototyping

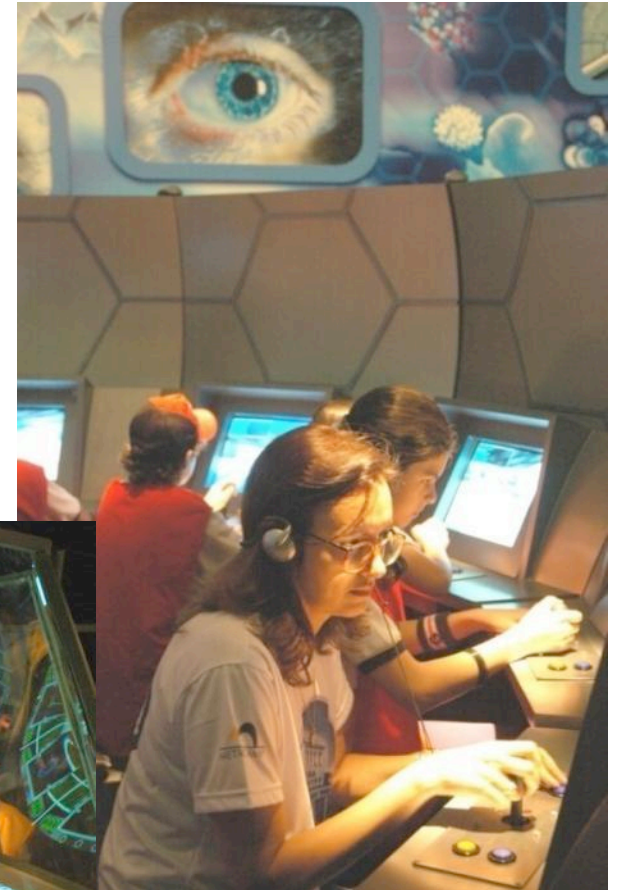


# Actors, mediators...





# NanoAventura (NanoAdventure)



<http://www.mc.unicamp.br/nanoaventura>



# Lessons learned

- **Negative points**
- **Bad solutions** – In some cases, the solutions that were used were not the best, or rather expensive.
- **Wrong perspectives** – We had a completely distorted expectation regarding funding and operation costs. We had to learn during the process, quite painfully.
- **Audience** – We faced an unexpected problem, trying to convince teachers to bring the students to NanoAventura (fear of the unknown).



# Lessons learned

- **Positive points**
- **Ignorance** – quite paradoxically, the complete ignorance about the process of building an exhibition was fundamental. If we had known the problems in advance, probably we would not have accepted the challenge.
- **Budget** – Not only we had a good budget, but also we had freedom to use it where it was necessary without any delay.
- **Team** – We were able to rapidly form a team of energetic, young people, that was able to spend days and nights working together with scientists to make it happen.

# After that... New projects!

- **Temporary exhibitions**
- **Challenge Workshop** (2006)
- **Time & Space Square**: first, open air, permanent exhibition of the Science Museum (2009)
- **1st Olympiad on Brazil's History**
- **Other activities**: movies, theater, round tables, seminars...



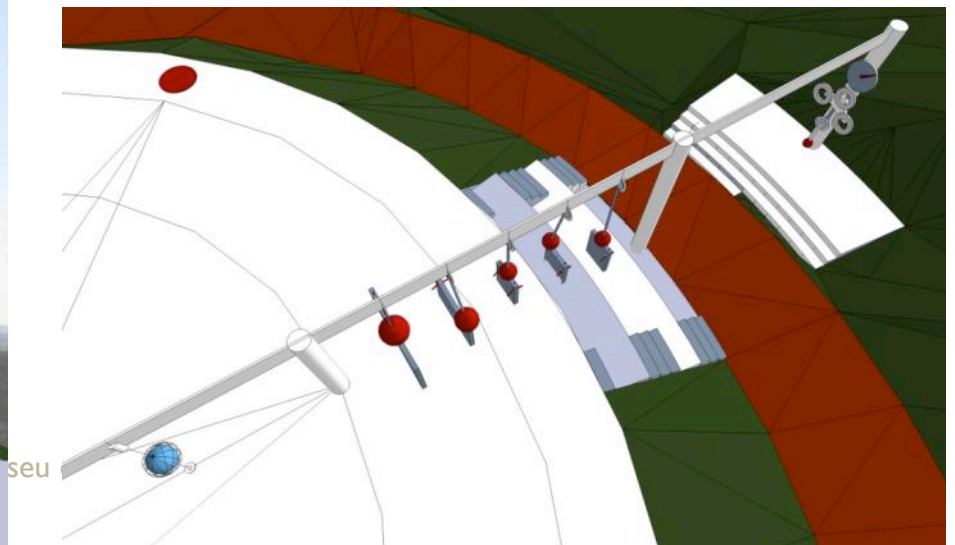
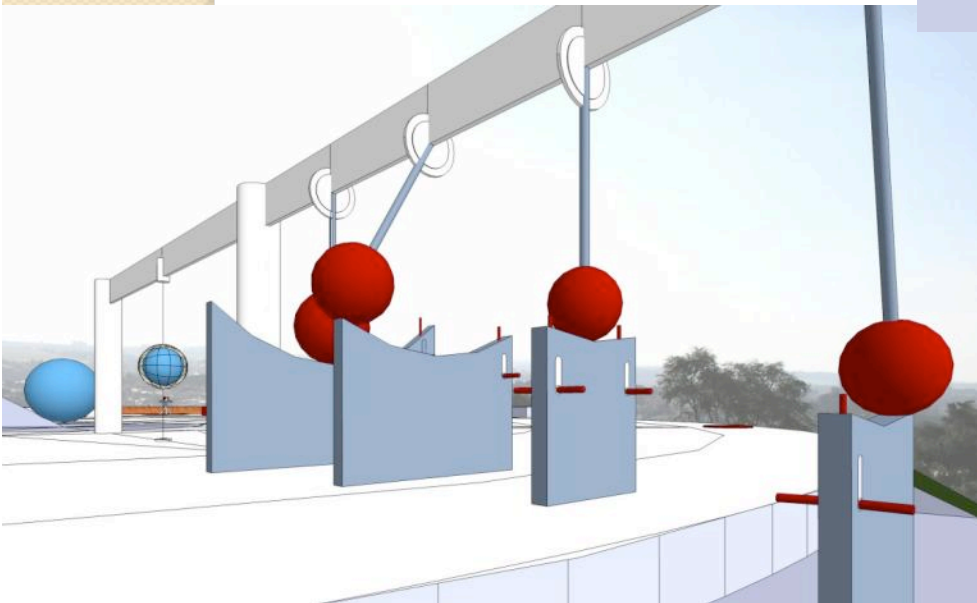
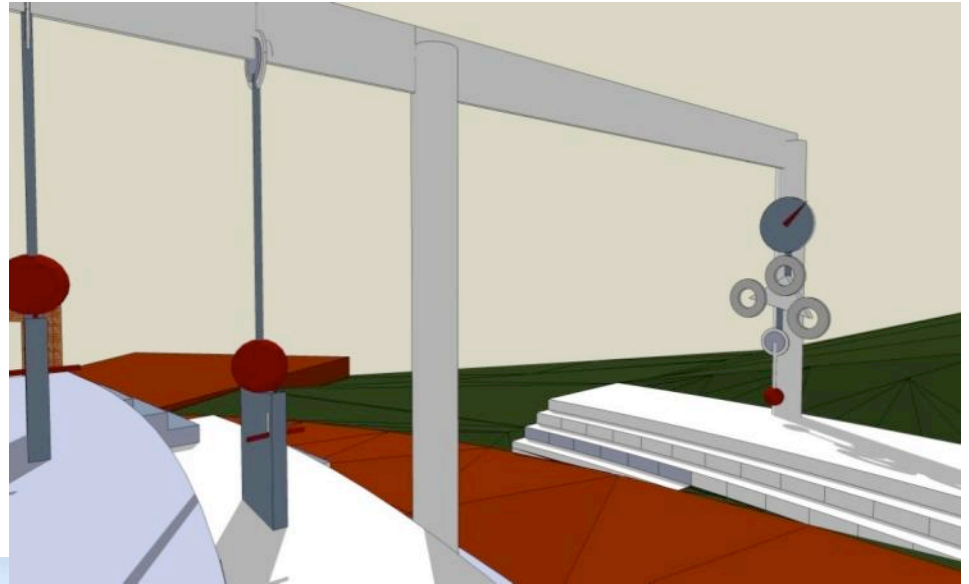
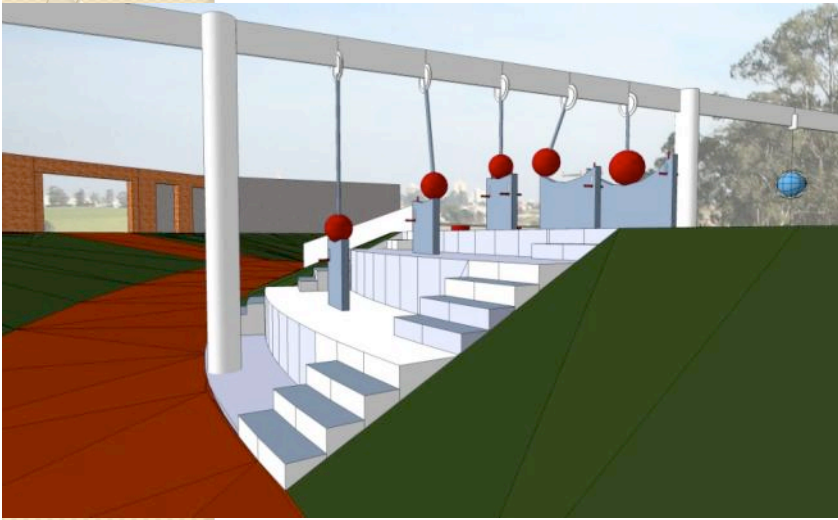
# Permanent location



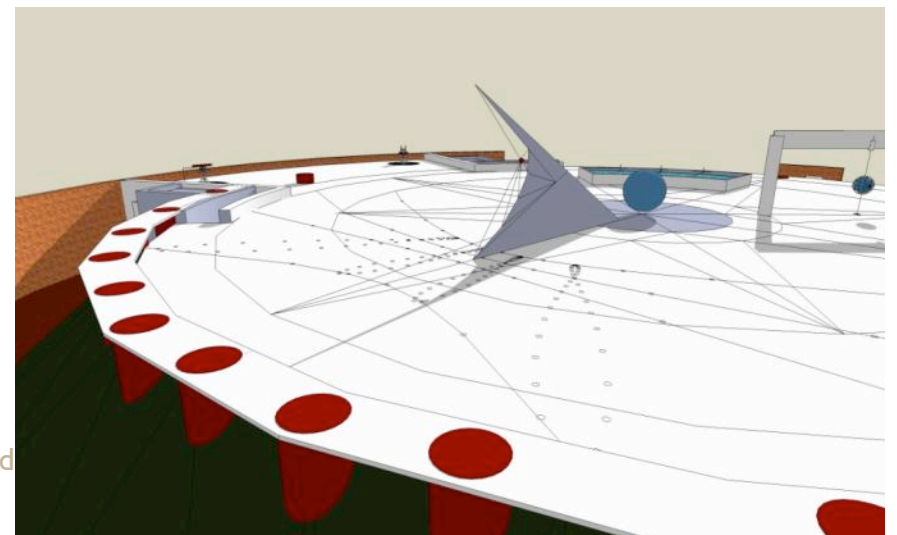
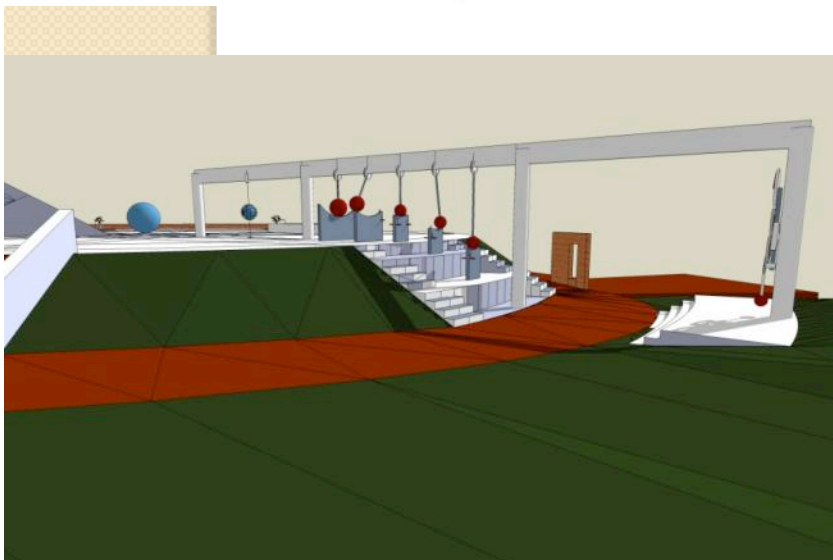
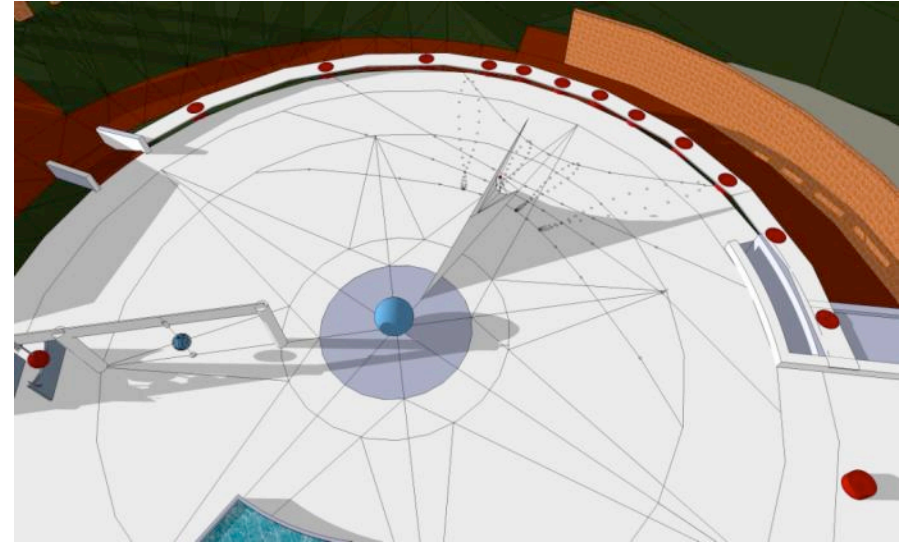
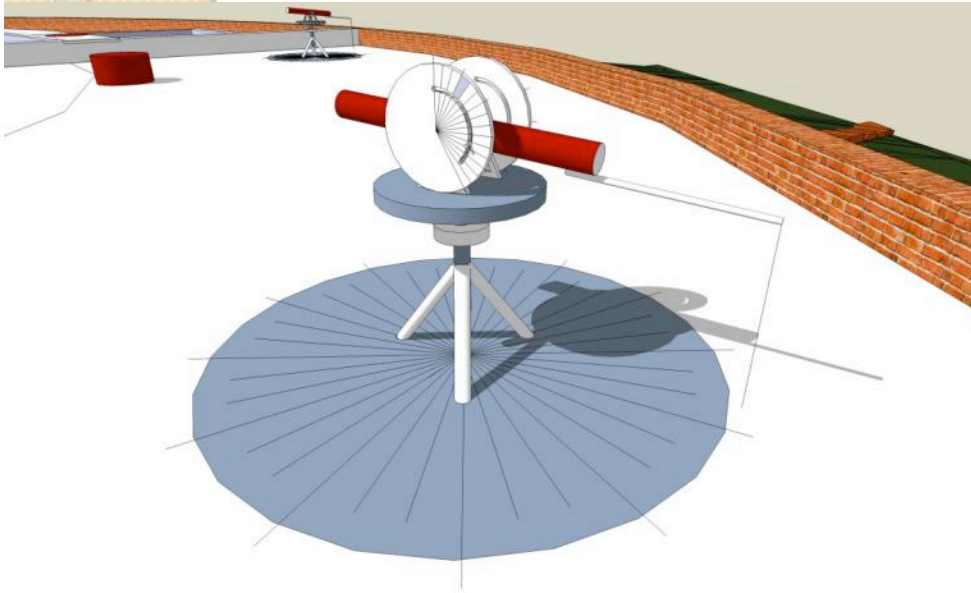
# Work in progress



# Time & Space Square

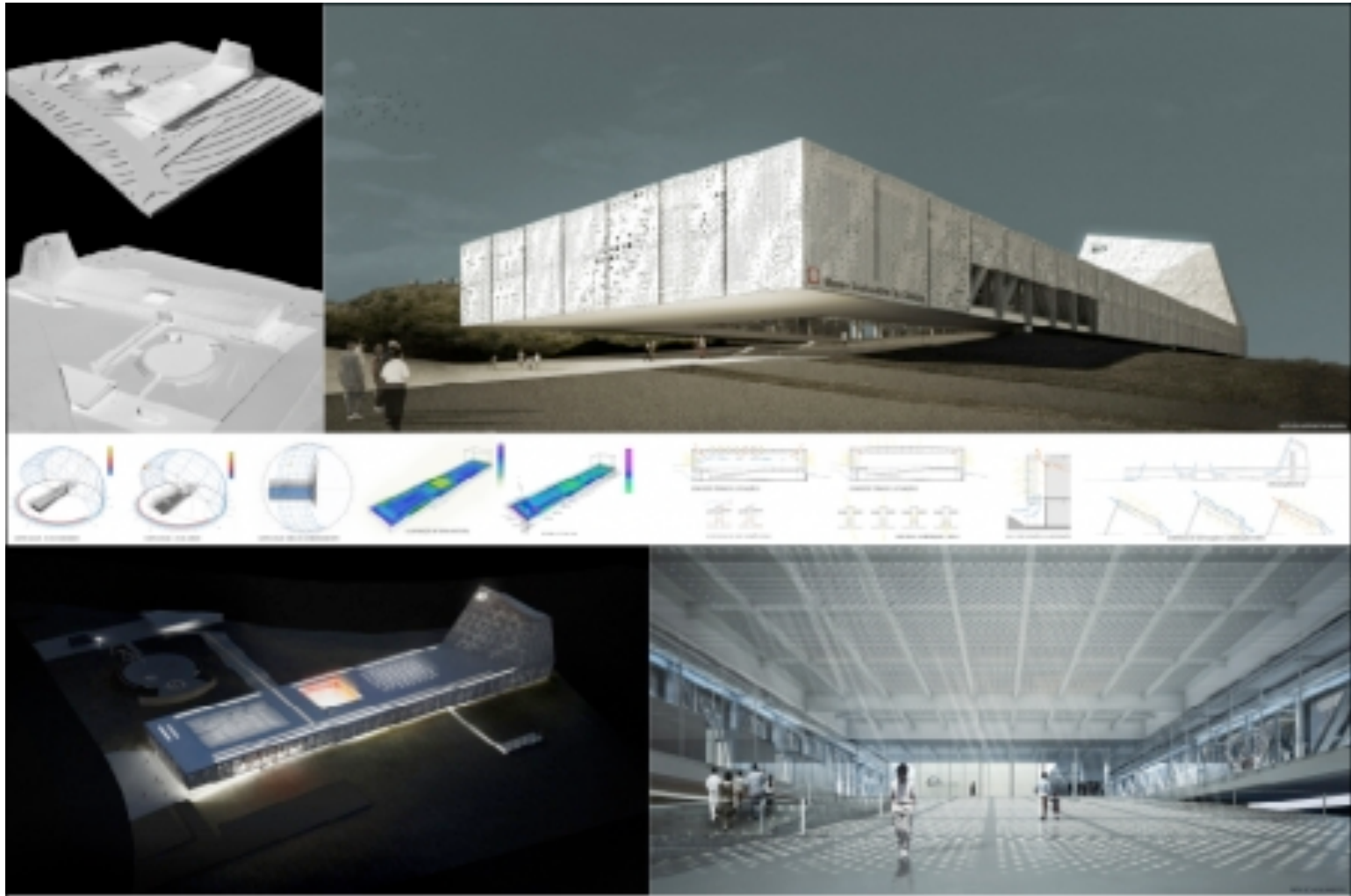


# Time & Space Square

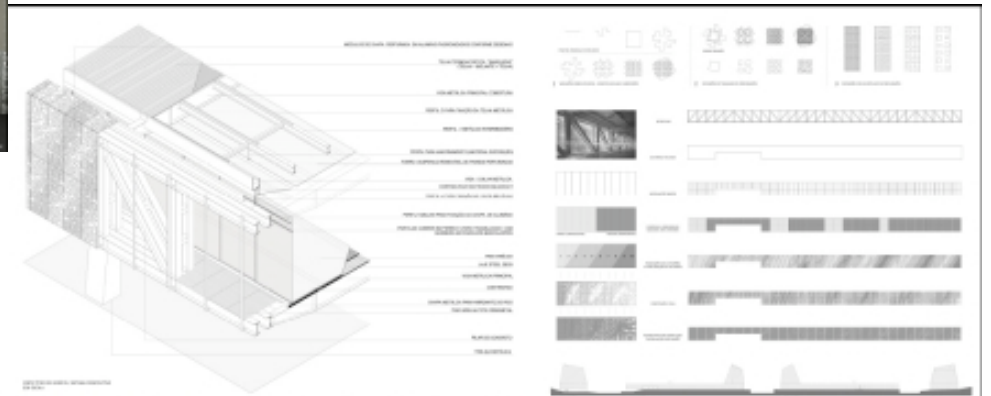
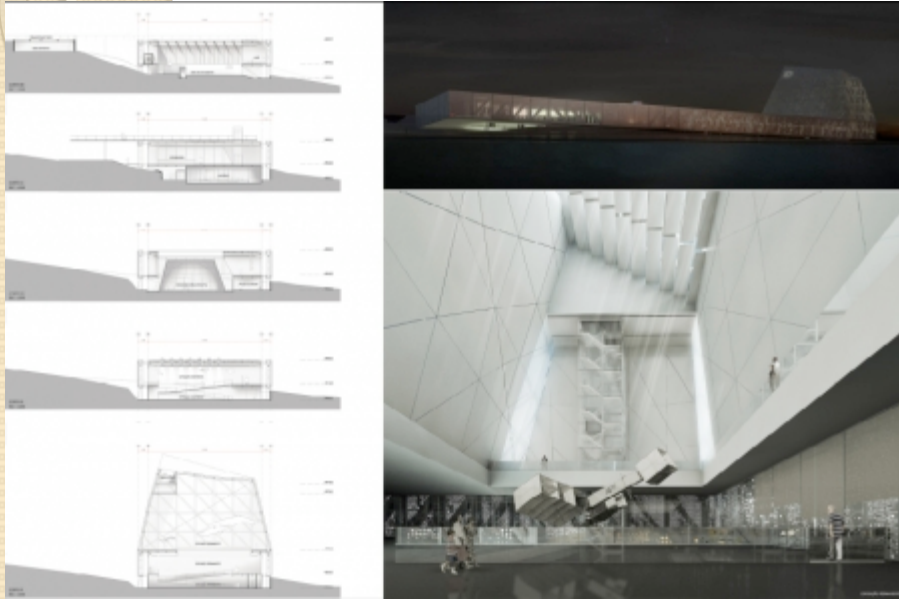


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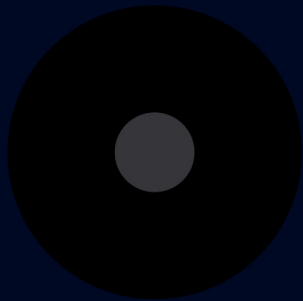
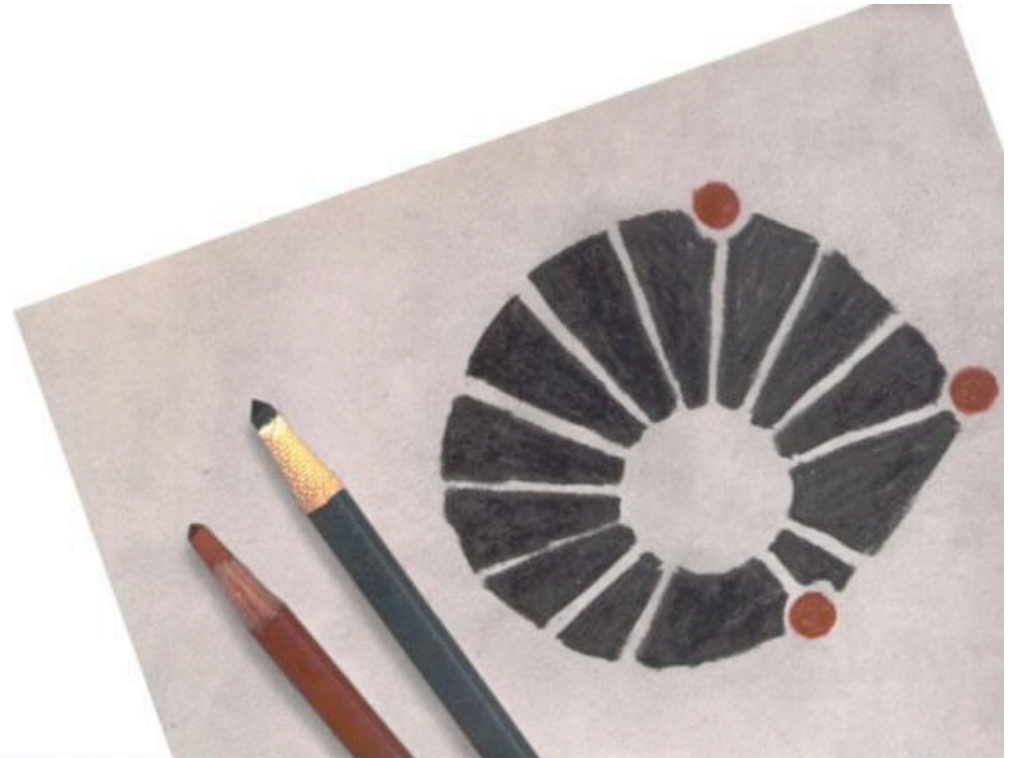
# Project of the new building



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Thanks



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