university of Oregon – school of architecture and allied arts – department of architecture arch4/585 advanced architectural design – nancy cheng

**ORGANIZATION inside and outside** Assignment 4



## I. GUTS - internal organization

for Mon Feb 15

We are working towards presenting the concept, site, building and material ideas at the review in Portland on Monday March 25. The complexity of an architectural design means that it is impossible to think about all aspects of a project at once. Methodically moving through different considerations and different visualizations can lead to a more thoughtful design. Experienced designers are particularly agile at moving between scales to reveal and solve different questions in a design problem.

1. From the pinup feedback, create DIAGRAMS of key ordering principles

- site relationships
- spatial hierarchies
- circulation
- contrasting areas: open | closed , light | dark , social | private

2. Work in **plan and section** to bring your massing ideas to life, sketching variations before committing things to the computer. Draw building SECTIONS to explore how the project relates to the urban and natural systems. Speculate in overlay sketches how to create thin and thick transitions from outside to inside.

3. If you haven't got one, create an updated PHYSICAL MODEL that summarizes your ideas. It should help you explain major outdoor spaces, entrances.

## II. SKIN – external expression

Bring 3 alternatives for Wed 2/17, refine for Mon 2/25 presentation

In patterning and organization, a successful façade design expresses a building's identity – the activities, order and atmosphere occurring within. Facades serve as thresholds between interior and public exterior space, allowing the transmission of desired phenomenon (views + contact between people, cooling summer breezes, light, the exhaling of stale indoor air) and the disruption or blockage of unwanted phenomenon (direct summer sun, winter rains, etc.). Issues of materials and proportions are important factors that will start to breed an expressive "style" in your project.



Consider:

Bud Clark Commons by Holst Architecture

- Context: What constitutes a Northwest, Willamette Valley, or Portland "style"? How can your building respond to this built context as well as the views on the site?
- 2. **Materials:** How can regional and reusable materials be beautifully composed? Where should the materials express their roles of Structure, Skin, or Services (Stewart Brand) versus setting a quiet background? What materials fit the durability requirements and the aesthetics of an outdoor recreation center?
- 3. **Composition:** How can structural bays, openings, roof profiles and overhangs help organize the building into legible chunks that contribute to a rhythmic unified whole? How can you tune the openings and roof sizes, shapes and proportions to site elements, vehicles, & occupants? How will your building announce entry and arrival?
- 4. **Building Performance:** How can ECS issues such as daylighting, sunshading and ventilation be integrated into expressive elevations?
- 5. **Natural Infrastructure**: How can your building contribute ecologically? (i.e. green walls of edible plants, wildlife habitats and corridors)



Self-shading skins collected by Mehrnoush Latifi Khorasgani, RMIT University

## REFERENCES

- Digital Sketching, <u>http://sketching.uoregon.edu/</u>
- Frampton, Kenneth and John Cava, *Studies in Tectonic Culture*. Cambridge, MA: MIT Press. NA642.F72 1995
- Maki, Fumihiko, *Nurturing Dreams: collected essays on architecture in the city.* Cambridge, MA: MIT Press, 2008. NA1559.M24 A35 2008
- Zumthor, Peter, Thinking Architecture, Birkhauser, 2006 NA1353.Z86 A35 2010