

Lecture No.3: TECTONICS

Fri. Feb. 3, 2006

Semper, Gottfried. The Four Elements of Architecture (1851, 1989) read pp.102-104, 126-128, 254-255.

Questions to think about: What are the four elements of architecture as described by Semper? What are the four technical skills associated with the elements? What is the relationship of weaving, textiles and carpets to architecture? What is the relationship of “dressing” (or masking) and “structural form” in Greek architecture? What practical applications does Semper dictate for current (1851) architecture?

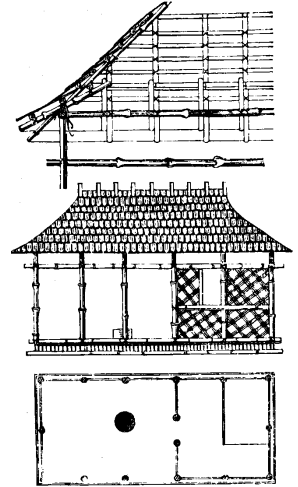
Semper's Carribean Hut:

4 Elements:	Hearth	Mound	Frame	Enclosure
4 Materials:	Tile, Iron	Masonry	Wood	Carpet
4 Techniques:	Molding	Pile	Cut	Weave
4 Ontologies:	Moral/Social	Earth	Sky	Space

See also:

Semper, The Style in the Technical Arts (1863, 2004)

Bötticher, Karl. Tectonics of the Hellenes (1844; see Oechslin below)



3.29
Gottfried Semper, illustration from *Der Stil in den technischen und tektonischen Künsten*, 1860–1863. The Caribbean hut in the Great Exhibition of 1851.

Readings on Studio Website:

Loos, Adolf. “The Principle of Cladding” (1898) in Spoken into the Void: Collected Essays 1897-1900, intro. Aldo Rossi (Cambridge, MA: MIT, 1982) pp.66-69.

Frampton, Kenneth. Excerpt from “Rappel a l’Ordre, the Case for the Tectonic,” in Charles Jencks, ed., Theories and Manifestoes of Contemporary Architecture (1997), pp.254-255. Originally published in Architectural Design 60:3-4 (1990); republished in Kate Nesbitt, ed. Theorizing a New Agenda for Architecture (1996), pp.516-528.

Benedikt, Michael. “Materiality,” in For an Architecture of Reality (1987) pp.44-50

LeCuyer, Annette. “Radical Tectonics: Making and Meaning,” in Radical Tectonics (2001) pp.15-23.

Optional:

Frampton, Kenneth. “Reflections on the Scope of the Tectonic,” in Studies in Tectonic Culture: the Poetics of Construction in 19th and 20th Century Architecture (1995), pp.1-6, 16-21.

Other Sources:

Oechslin, Werner. Otto Wagner, Adolf Loos and the Road to Modern Architecture (2003); including an anthology of primary sources.

Porphyrios, Demetri. “From Techne to Tectonics,” in A. Ballantyne, ed. What is Architecture? (2002) pp:129-37.

Sekler, Eduard. “Structure, Construction, Tectonics” from Structure in Art & Science (1965)

Hartoonian, Gevorak. The Ontology of Construction (1994)

Semper, Gottfried

Der Stil (1860-63)

(= Style in the Technical and Tectonic Arts, 2004)

vol.2, Ch.8, "Tectonics"

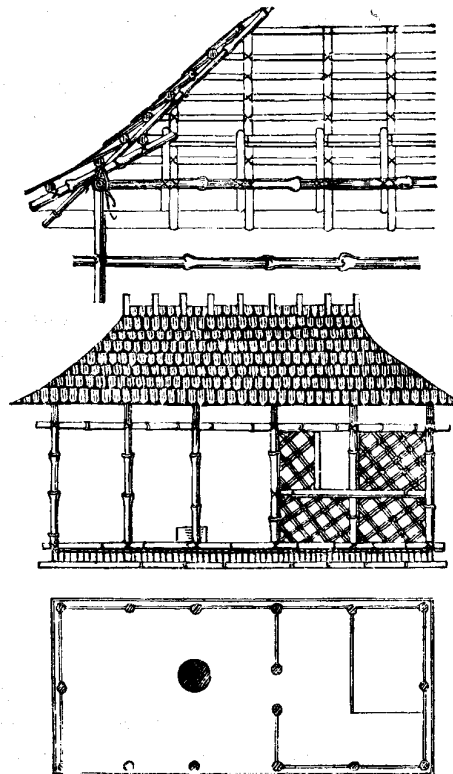
pp.665-666.

§ 145 Greco-Italic Tectonics: Timber Architecture

The Primitive Hut

For the Greco-Italic peoples the mystical-poetic and artistic *motive* for the temple, though *not* its material *model* or scheme, was the leaf-covered hut—the protective roof supported by tree trunks, covered with straw or reeds, and enclosed with woven mats. According to Vitruvius, the marble temple is *in fact* nothing more than a petrified primitive hut, whose whole and parts materially arose or were directly derived from the basic elements of a wooden hut. Opponents of this homebred theory, in their zeal for the immediacy of the stone temple, nevertheless have to return to the (as they call it) *hieratic* allegory or symbol of the sacred *arbor* (σκηνή). And even though this may be a late poetic creation, perhaps first completely developed by dramatists in the golden age of Athens and placed onstage before the Athenians, it remains *as such* a very important element in the history of style. The architecture of a period that produced such theories was necessarily influenced by them to a greater or lesser extent.

Having said this, the author does not wish to be misunderstood when he places before the reader—as the equivalent of the Vitruvian primitive hut in this is an illustration of a wooden or a Caribbean bamboo hut displayed at the Great Exhibition of 1851 in London. It shows all the elements of antique architecture in their pure and most original form: the *hearth* as the center-point, raised earth as a *terrace* surrounded by posts, the column-supported roof, and the mat enclosure as a *spatial termination* or *wall*.



Caribbean hut