

# Make Architecture Sound

In my first year of architecture, in Ghent, a studio project was given called "point, line, square (carré)." The task preceded its author. Years later, I learned that it had sprouted from the structuralist brain of Peter Eisenman. Meanwhile, Eisenman had already switched to deconstruction and work based on "forces in box."

The slip of tongue is Poincaré. Thus I had a "good intuition" of certain elementary forms and structures before I ever saw Eisenman's buildings. In a Deleuzian reflex, one could say it is the event that precedes the eye/I. Probably with the same coincidence, the *Anytime* conference landed in Paris last year: right in the rue Poincaré. For sure, Henri Poincaré is a big point in history (mathematics, philosophy, physics) and one question opens: Have we, architects, left this street now or not?

In the neo-Kantian stance that Poincaré defends, pure intuition is a source of knowledge, and originally intuition meant "seeing": our actions, our grasp of things and space, is governed by Euclidean geometries, Platonic solids, traces of an immemorial time.<sup>1</sup> Karl Popper refers to this idea as "associationist theory"; Gestalt psychology names it "fronto-parallelism."

How can we imagine pure intuition as an autonomous form of knowledge? It's sufficient to shut the eyes, imagine a cube, rotate it, and count the faces. It's impossible, however, to do so with an irregular or fluid shape. Gestalt psychology has fallen into disregard,<sup>2</sup> but look at what computer animation can do nowadays — and with irregular or fluid forms. I reformulate my question: will the development of software programs revive the old fascination with form and seeing?<sup>3</sup> Is this the revolution that we are waiting for in architecture land? Obviously, there is more to it.

During my year in London, I became interested in Popper's "discourse," not in the least because his visual sense is rather poor.<sup>4</sup> Popper developed his three world system as an answer to Cartesian dualism, to neo-Kantian parallelism.  $Mam/brain=W2$  uses  $matter=W1$  to produce artifacts= $W3$  (architecture, machines, music). What makes this theory attractive is that "man" can produce good things but also bad things, and this sounds quite profane compared to the law of intuition.

Against pure intuition, Popper places language and logical deduction. I admit that Popper ventures into an open yet more stable world that I take for granted. Criticism is a key word, yes, but more objective knowledge in architecture could quickly mean more profession, more construction. Elements that don't work so straightforwardly are easily selected out. Then again, the way is paved for those who see the architectural "light" in a flash.

Within an architectural context, we could translate "logical deduction" as topology and Popper's plea for false or true propositions as prepositions. Topology is connected to prepositions in children's games: piling up blocks — on, to, for. The educationist Jean Piaget already observed that the development of the intellect evolves from topology to projective geometry to pure geometry.<sup>5</sup> In the realm of architectural history, it's thinkable to make a downward journey, from pure geometry to topology, in order to jump into the dark.

Prepositions as an opener. From a literary corner, Michel Foucault noted that prepositions glitter in their limitation to name things, but become particularly valuable as elements of organization and function.<sup>6</sup>

Form and function, seeing and knowing. Where do we go from here? Rosalind Krauss makes a distinction between the vertical axis of the image and the horizontal axis of writing, between nature and culture.<sup>7</sup> We can elaborate this framework to architecture by matching vertical with "form" and horizontal with "function."

Points and blocks.<sup>8</sup>

This axial system is clearly a molar, an arborescent system ready to conceive a cloud, an aggregation of points. A scatogram to be used by the artist, architect, musician as a springboard to the "other," to a "becoming." How, then, do we fill in the points/plots/coordinates? It's here that we are saved by the musician. Words can click together on the basis of their phonetic repercussion.

Minimal (form) — liminal (function). Vitalist (form) — relativist (function). Graffiti (form) — gravity (function). Taken together, these doubles form a treasure map with invisible lines that run from one design to the other. They break with the big point — carré.

My advice to friends and contemporaries: architecture doesn't have to look fluid to be "open" nonetheless. This is our line of flight. Finally, two remarks count: with Greg Lynn, topology is already fluidity, away from discrete systems, with Mark Rakatansky, it seems that dynamics (fluidity, loops, limit cycles), on the one hand, and topology (inside, outside), on the other, form the two halves of the same coin.<sup>9</sup> No lines of flight without a framework. Point at the line.

## Notes

1. See Karl Popper, *Objective Knowledge: An Evolutionary Approach* (Oxford: Clarendon Press, 1972), 130, and Arthur I. Miller, *Imagery in Scientific Thought: Creating 20th-Century Physics* (Boston: Birkhauser, 1984), 19, 25, 30.
2. Karl Popper and John C. Eccles, *The Self and Its Brain* (London: Routledge, 1983), 533.
3. The computer is a bucket? It's not so simply put that fluid and soft equals an open system and solid and square equals a closed one. According to Popper, *Objective Knowledge*, 62, gestalten are both static and molecular.
4. "My aim is not (unlike Descartes, Locke, Kant) to build a secure system or foundations" (*ibid.*, 33).
5. See Bill Hillier and Julienne Hanson, *The Social Logic of Space* (Cambridge: Cambridge University Press, 1984), 137, 147.
6. Michel Foucault, *The Order of Things: An Archaeology of the Human Sciences* (London: Tavistock, 1966), 99–100.
7. See Rosalind Krauss, "The Scatology of Anywhere," in *Anywhere* (New York: Rizzoli, 1992), 252.
8. Gilles Deleuze and Félix Guattari, *A Thousand Plateaus: Capitalism and Schizophrenia* (London: The Athlone Press, 1987), 291–98.
9. Greg Lynn, *Animate Form* (New York: Princeton Architectural Press, 1999), 20; Mark Rakatansky, "Transformational Constructions," *Assemblage* 19 (December 1992): 11.